

Annual Information Form

March 28, 2019

For the financial year ended December 31, 2018

 **GOLDCORP**

GOLDCORP INC.
ANNUAL INFORMATION FORM
FOR THE FINANCIAL YEAR ENDED DECEMBER 31, 2018

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INTRODUCTORY NOTES

Cautionary Note Regarding Forward-Looking Statements

This annual information form contains “forward-looking statements” within the meaning of Section 27A of the United States Securities Act of 1933, as amended, Section 21E of the United States Exchange Act of 1934, as amended, the United States Private Securities Litigation Reform Act of 1995, or in releases made by the United States Securities and Exchange Commission (“SEC”), all as may be amended from time to time, and “forward-looking information” under the provisions of applicable Canadian securities legislation, concerning the business, operations and financial performance and condition of Goldcorp Inc. (“we”, “us”, “our” or “Goldcorp”). Forward-looking statements include, but are not limited to: statements relating to Newmont Mining Corporation’s (“Newmont”) planned acquisition of all of our issued and outstanding Common Shares (as defined below) (the “Proposed Transaction”) and the expected terms, timing and closing of the Proposed Transaction, including expectations for receipt of required approvals and satisfaction of other customary closing conditions, statements with respect to the future price of gold, silver, zinc, copper and lead, the estimation of Mineral Reserves (as defined below) and Mineral Resources (as defined below), the realization of Mineral Reserve estimates, the timing and amount of estimated future production, costs of production, targeted cost reductions, capital expenditures, free cash flow, costs and timing of the development of new deposits, success of exploration activities, permitting and certification time lines, hedging practices, currency exchange rate fluctuations, requirements for additional capital, government regulation of mining operations, environmental risks, unanticipated reclamation expenses, health, safety and diversity initiatives, timing and possible outcome of pending litigation, title disputes or claims and limitations on insurance coverage. Generally, these forward-looking statements can be identified by the use of words such as “plans”, “expects”, “is expected”, “budget”, “scheduled”, “estimates”, “forecasts”, “intends”, “anticipates”, “believes”, or variations or comparable language of such words and phrases or statements that certain actions, events or results “may”, “could”, “would”, “should”, “might” or “will”, “occur” or “be achieved” or the negative connotation thereof.

Forward-looking statements are necessarily based upon a number of factors and assumptions that, if untrue, could cause our actual results, performance or achievements to be materially different from future results, performance or achievements expressed or implied by such statements. Such statements and information are based on numerous assumptions regarding our present and future business strategies and the environment in which we will operate in the future, including the price of gold, anticipated costs and ability to achieve goals. Certain important factors that could cause actual results, performance or achievements to differ materially from those in the forward-looking statements include, among others, gold price volatility, discrepancies between actual and estimated production, Mineral Reserves and Mineral Resources and metallurgical recoveries, mining operational and development risks, litigation risks, regulatory restrictions (including environmental regulatory restrictions and liability), changes in national and local government legislation, taxation, controls or regulations and/or change in the administration of laws, policies and practices, expropriation or nationalization of property and political or economic developments in Canada, the United States, Mexico, Argentina, Chile, the Dominican Republic or other jurisdictions in which we carry on business, or may carry on business in the future, delays, suspensions or technical challenges associated with capital projects, higher prices for fuel, steel, power, labour and other consumables, currency fluctuations, the speculative nature of gold exploration, the global economic climate, dilution, share price volatility, competition, loss of key employees, additional funding requirements and defective title to mineral claims or property, the prompt and effective integration of Newmont’s and Goldcorp’s businesses and the ability to achieve the anticipated synergies and value-creation contemplated by the Proposed Transaction. Although we believe our expectations are based upon reasonable assumptions and have attempted to identify important factors that could cause actual actions, events or results to differ materially from those described in forward-looking statements, there may be other factors that cause actions, events or results not to be as anticipated, estimated or intended.

Forward-looking statements are subject to known and unknown risks, uncertainties and other important factors that may cause our actual results, level of activity, performance or achievements to be materially different from those expressed or implied by such forward-looking statements, including but not limited to: future prices of gold, silver, zinc, copper and lead; mine development and operating risks; possible variations in ore reserves, grade or recovery rates; risks related to international operations, including

economic and political instability in foreign jurisdictions in which we operate; risks related to current global financial conditions; risks related to joint venture operations; actual results of current exploration activities; actual results of current reclamation activities; environmental risks; conclusions of economic evaluations; changes in project parameters as plans continue to be refined; failure of plant, equipment or processes to operate as anticipated; accidents, labour disputes and other risks of the mining industry; risks associated with restructuring and cost-efficiency initiatives; delays in obtaining governmental approvals or financing or in the completion of development or construction activities; risks related to the integration of acquisitions; risks related to indebtedness and the service of such indebtedness, as well as those factors discussed in the section entitled “Risk Factors” in this annual information form. In addition, risks associated with the Proposed Transaction that could cause actual results to differ from forward-looking statements include: (i) the risk associated with each of Newmont’s and Goldcorp’s ability to obtain approval of the Proposed Transaction from its respective stockholders and shareholders and the timing of the closing of the Proposed Transaction, including the risk that the conditions to the Proposed Transaction are not satisfied on a timely basis or at all and the failure of the Proposed Transaction to close for any other reason; (ii) the risk that a consent or authorization that may be required for the Proposed Transaction is not obtained or is obtained subject to conditions that are not anticipated; (iii) the outcome of any legal proceedings that may be instituted against the parties and others related to the Arrangement Agreement (as defined below) or the Proposed Transaction; (iv) unanticipated difficulties or expenditures relating to the Proposed Transaction, the response of business partners and retention as a result of the announcement and pendency of the Proposed Transaction; (v) risks relating to the value of the Newmont’s common stock to be issued in connection with the Proposed Transaction; (vi) the anticipated size of the markets and continued demand for Newmont’s and Goldcorp’s resources and the impact of competitive responses to the announcement of the Proposed Transaction; and (vii) the diversion of management time on issues related to the Proposed Transaction, as well as those factors discussed in the section entitled “Risk Factors” to our management information circular dated March 4, 2019 (the “**Circular**”).

Although we have attempted to identify important factors that could cause actual results to differ materially from those contained in forward-looking statements, there may be other factors that cause results not to be as anticipated, estimated or intended. There can be no assurance that such statements will prove to be accurate, as actual results and future events could differ materially from those anticipated in such statements. Accordingly, readers should not place undue reliance on forward-looking statements. The forward-looking statements contained in this annual information form are made as of the date of this annual information form and, accordingly, are subject to change after such date. Except as otherwise indicated by us, these statements do not reflect the potential impact of any non-recurring or other special items or of any disposition, monetization, merger, acquisition, other business combination or other transaction that may be announced or that may occur after the date hereof. Forward-looking statements are provided for the purpose of providing information about management’s current expectations and plans and allowing investors and others to get a better understanding of our operating environment. We do not intend or undertake to publicly update any forward-looking statements that are included in this annual information form, whether as a result of new information, future events or otherwise, except in accordance with applicable securities laws.

Cautionary Note to United States Investors Concerning Estimates of Measured, Indicated and Inferred Resources

The Mineral Resource and Mineral Reserve estimates contained in this annual information form have been prepared in accordance with the requirements of Canadian securities laws, which differ from the requirements of United States securities laws currently in effect and use terms that are not recognized by the SEC. These standards differ significantly from the disclosure requirements of the SEC currently in effect, and Mineral Reserve and Mineral Resource information contained and incorporated by reference herein may not be comparable to similar information disclosed by U.S. companies in accordance with the rules and regulations promulgated by the SEC currently in effect.

Canadian reporting requirements for disclosure of mineral properties are governed by the Canadian Securities Administrators’ National Instrument 43-101 – *Standards of Disclosure for Mineral Projects* (“**NI 43-101**”). The definitions used in NI 43-101 are incorporated by reference from the Canadian Institute of

Mining, Metallurgy and Petroleum (“**CIM**”) — Definition Standards adopted by CIM Council on May 10, 2014 (the “**CIM Definition Standards**”). U.S. reporting requirements are currently governed by the SEC Industry Guide 7 (“**Industry Guide 7**”) under the United States Securities Act of 1933, as amended. These reporting standards have similar goals in terms of conveying an appropriate level of confidence in the disclosures being reported, but embody different approaches and definitions. For example, the terms “Mineral Reserve”, “Proven Mineral Reserve” and “Probable Mineral Reserve” are Canadian mining terms as defined in NI 43-101, and these definitions differ from the definitions in Industry Guide 7. Under SEC standards, mineralization may not be classified as a “reserve” unless the determination has been made that the mineralization could be economically and legally produced or extracted at the time of the reserve determination. Among other things, a “final” or “bankable” feasibility study is required to report reserves and the primary environmental analysis or report must be filed with the appropriate governmental authority in order to classify mineralized material as reserves under SEC standards. Accordingly, Mineral Reserve estimates contained in this annual information form may not qualify as “reserves” under SEC standards. Further, the SEC has not recognized the reporting of mineral deposits which do not meet the Industry Guide 7 definition of “reserve” prior to the adoption of the Modernization of Property Disclosures for Mining Registrants, which rules will be required to be complied with in the first fiscal year beginning on or after January 1, 2021. In accordance with NI 43-101, the terms “Mineral Reserve”, “Proven Mineral Reserve”, “Probable Mineral Reserve”, “Mineral Resource”, “Measured Mineral Resource”, “Indicated Mineral Resource” and “Inferred Mineral Resource” used in this annual information form are defined in the CIM Definition Standards. While the terms “Mineral Resource”, “Measured Mineral Resource”, “Indicated Mineral Resource” and “Inferred Mineral Resource” are recognized and required by NI 43-101, the SEC does not currently recognize them. While those terms are recognized and required by Canadian Securities Laws, Industry Guide 7 does not normally permit the inclusion of information concerning “Measured Mineral Resources”, “Indicated Mineral Resources” and “Inferred Mineral Resources” or other descriptions of the amount of mineralization in mineral deposits that do not constitute “reserves” by United States standards in documents filed with the SEC. United States readers are specifically cautioned not to assume that any part or all of the mineral deposits in these categories will ever be converted into mineral reserves, as defined by the SEC.

In addition, “Inferred Mineral Resources” have a great amount of uncertainty as to their existence and their economic and legal feasibility. A significant amount of exploration must be completed in order to determine whether an Inferred Mineral Resource may be upgraded to a higher category. Under Canadian regulations, estimates of Inferred Mineral Resources may not form the basis of feasibility or prefeasibility studies, except in rare cases. United States readers are cautioned not to assume that all or any part of an Inferred Mineral Resource exists or is economically or legally mineable or that it will ever be upgraded to a higher category. Likewise, United States readers are cautioned not to assume that all or any part of Measured or Indicated Mineral Resources will ever be upgraded to Mineral Reserves. Disclosure of “contained ounces” in a resource is permitted disclosure under Canadian regulations if such disclosure includes the grade or quality and the quantity for each category of Mineral Resource and Mineral Reserve; however, the SEC normally only permits issuers to report mineralization that does not constitute “reserves” by SEC standards as in place tonnage and grade without reference to unit measures.

Accordingly, information contained in this annual information form containing descriptions of our mineral deposits may not be comparable to similar information made public by United States companies subject to the reporting and disclosure requirements under United States federal securities laws and the rules and regulations thereunder.

Currency Presentation and Exchange Rate Information

This annual information form contains references to United States dollars (“\$” or “**US\$**”) and Canadian dollars (“**Canadian dollars**” or “**C\$**”). All dollar amounts referenced, unless otherwise indicated, are expressed in United States dollars.

The high, low, average and closing exchange rates for Canadian dollars in terms of the United States dollar, as quoted by the Bank of Canada, for each of the three years in the period ended December 31, 2018, were as follows:

	Year ended December 31		
	2018	2017	2016
High.....	C\$1.2288	C\$1.2128	C\$1.2544
Low	C\$1.3642	C\$1.3743	C\$1.4589
Average ⁽¹⁾	C\$1.2957	C\$1.2986	C\$1.3248
Closing	C\$1.3642	C\$1.2545	C\$1.3427

Note:

(1) Calculated as an average of the daily noon rates for 2016. For 2017 and 2018, calculated as prior day daily average.

On March 27, 2019, the daily average rate for Canadian dollars in terms of the United States dollar, as quoted by the Bank of Canada, was US\$1.00 = C\$1.3414.

Gold, Silver, Zinc, Copper and Lead Prices

The high, low, average and closing afternoon fixing gold and silver prices in United States dollars per troy ounce, as quoted by the London Bullion Market Association, and the official cash settlement copper prices in United States dollars per pound, as quoted on the London Metals Exchange, for each of the three years in the period ended December 31, 2018, were as follows:

	Year ended December 31								
	Gold			Silver			Zinc		
	2018	2017	2016	2018	2017	2016	2018	2017	2016
High.....	\$1,355	\$1,346	\$1,366	\$17.52	\$18.56	\$20.71	\$1.64	\$1.53	\$1.32
Low.....	\$1,178	\$1,151	\$1,077	\$13.97	\$15.22	\$13.58	\$1.04	\$1.10	\$0.66
Average...	\$1,268	\$1,257	\$1,251	\$15.71	\$17.05	\$17.14	\$1.33	\$1.31	\$0.95
Closing....	\$1,279	\$1,291	\$1,146	\$15.47	\$16.87	\$16.24	\$1.14	\$1.50	\$1.16

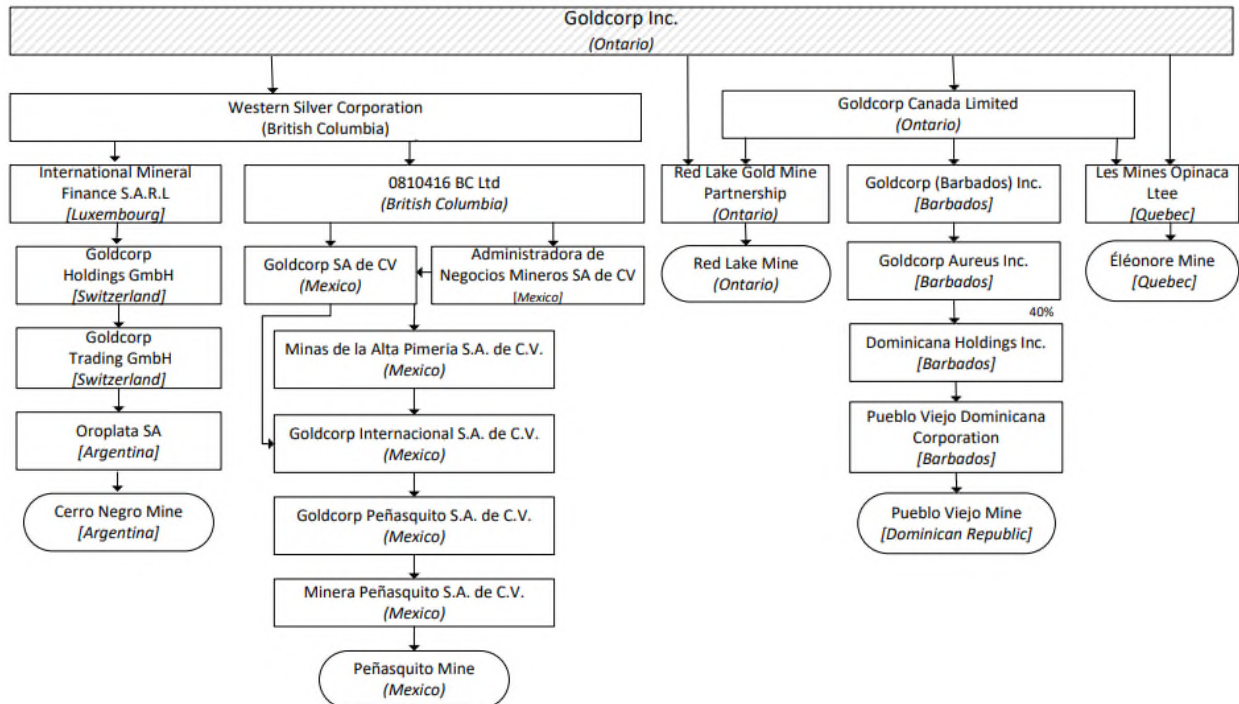
The high, low, average and closing official cash settlement lead and zinc prices in United States dollars per pound, as quoted on the London Metal Exchange, for each of the three years in the period ended December 31, 2018, were as follows:

	Year ended December 31					
	Copper			Lead		
	2018	2017	2016	2018	2017	2016
High.....	\$3.29	\$3.27	\$2.69	\$1.22	\$1.17	\$1.12
Low.....	\$2.64	\$2.48	\$1.96	\$0.85	\$0.91	\$0.72
Average...	\$2.96	\$2.80	\$2.21	\$1.02	\$1.05	\$0.85
Closing ...	\$2.71	\$3.25	\$2.50	\$0.91	\$1.13	\$0.90

CORPORATE STRUCTURE

Goldcorp is a corporation governed by the *Business Corporations Act* (Ontario) following its amalgamation with Glamis Gold Ltd. ("**Glamis**") on December 1, 2006. Our head office is located at Suite 3400, Park Place, 666 Burrard Street, Vancouver, British Columbia, V6C 2X8 and our registered office is located at Suite 2100, 40 King Street West, Toronto, Ontario, M5H 3C2.

The following chart illustrates our principal subsidiaries (collectively, the "**Subsidiaries**"), together with the governing law of each Subsidiary and the percentage of voting securities we beneficially own, control or direct, as well as our material properties as at December 31, 2018. In this annual information form, except as otherwise required by the context, any reference to "we", "us", "our" or "Goldcorp" means, collectively, Goldcorp Inc. and the Subsidiaries.



(1) Unless otherwise noted, each Subsidiary is wholly-owned, directly or indirectly, by Goldcorp.

GENERAL DEVELOPMENT OF THE BUSINESS

We are a senior gold producer engaged in the acquisition, exploration, development, operation, and reclamation of precious metal properties in Canada, the United States, Mexico, and Central and South America. Our current sources of operating cash flows are primarily from the sale of gold, silver, zinc, copper and lead. Our common shares (the “**Common Shares**”) are listed and posted for trading on the New York Stock Exchange (“**NYSE**”) under the symbol “GG” and on the Toronto Stock Exchange (“**TSX**”) under the symbol “G”.

As at December 31, 2018, our key operating mines and development projects are as follows:

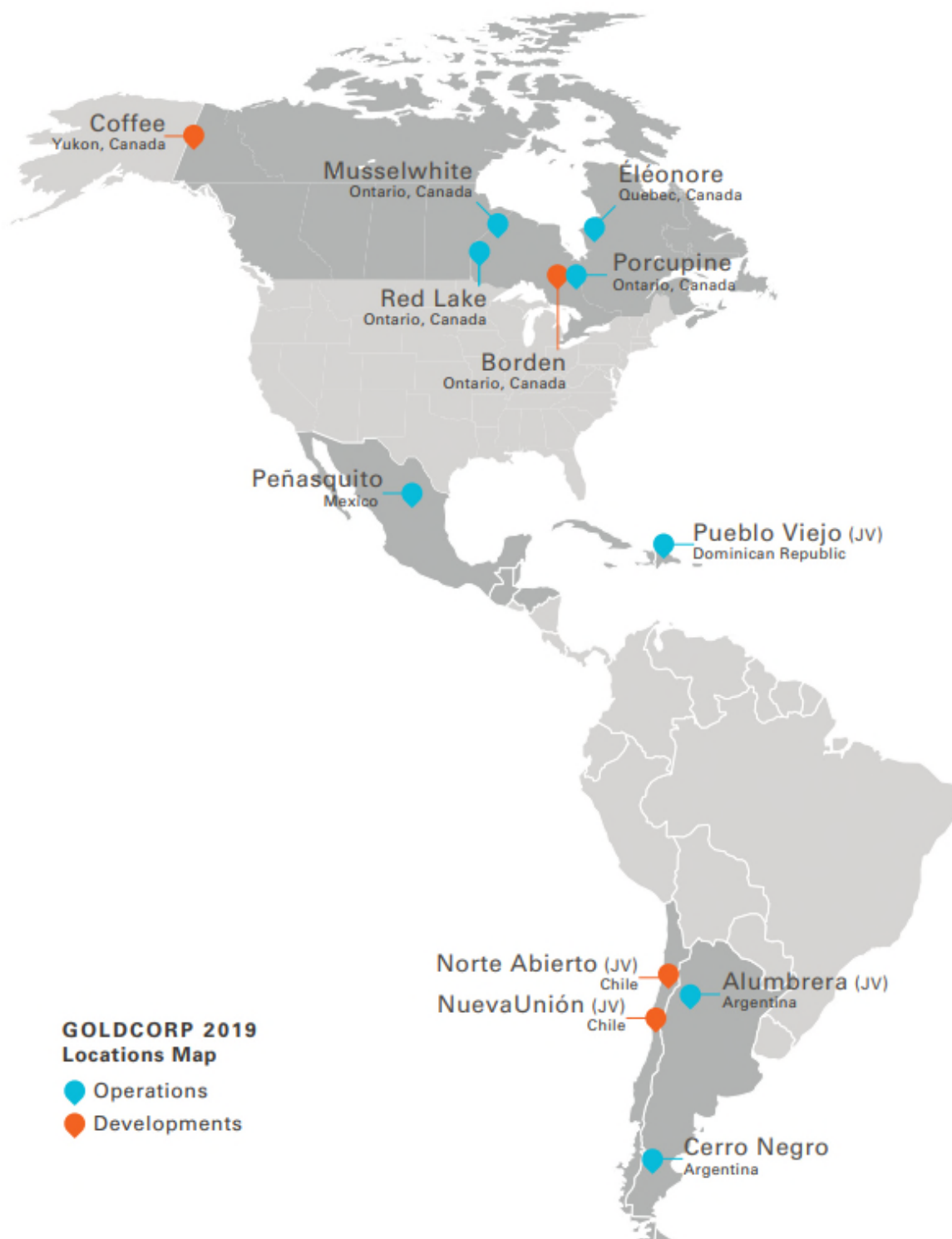
Operations

Name of Mine	Ownership	Location	Material Property
Red Lake gold mines (“ Red Lake Mines ”)	100%	Ontario, Canada	Yes
Éléonore gold mine (“ Éléonore Mine ”)	100%	Québec, Canada	Yes
Porcupine gold mines (“ Porcupine Mine ”)	100%	Ontario, Canada	No
Musselwhite gold mine (“ Musselwhite Mine ”)	100%	Ontario, Canada	No
Peñasquito gold-silver-lead-zinc mine (“ Peñasquito Mine ”)	100%	Mexico	Yes
Pueblo Viejo gold-silver-copper mine (“ Pueblo Viejo Mine ”)	40%	Dominican Republic	Yes
Cerro Negro gold-silver mine (“ Cerro Negro Mine ”)	100%	Argentina	Yes
Bajo de la Alumbrera gold-copper mine (“ Alumbrera Mine ”)	37.5%	Argentina	No

Development Projects

Name of Project	Ownership	Location	Material Property
Coffee gold project (“ Coffee Project ”)	100%	Yukon, Canada	No
Borden gold project (“ Borden Project ”)	100%	Ontario, Canada	No
NuevaUnión gold-copper project (“ NuevaUnión Project ”)	50%	Chile	No
Norte Abierto gold project (“ Norte Abierto Project ”)	50%	Chile	No

The following map illustrates our key operating mines and development projects, located in Canada, Mexico, Argentina, Chile and the Dominican Republic.



Three Year History

2016

On February 29, 2016, Mr. David A. Garofalo was appointed as our President and Chief Executive Officer, following the retirement of Mr. Charles A. Jeannes.

On March 9, 2016, we announced that Mr. Russell Ball had assumed the role of Executive Vice President, Chief Financial Officer and Corporate Development, following the departure of Mr. Lindsay Hall. Mr. Ball had been our Executive Vice President, Corporate Development and Capital Projects since 2013.

On April 28, 2016, Mr. Garofalo was elected to the Board of Directors (the “**Board**”) and Mr. John P. Bell, Mr. Douglas M. Holtby and Mr. Jeannes retired from our Board. Following the appointment and retirements, our Board was comprised of 9 members.

On July 19, 2016, we acquired all of the outstanding shares of Kaminak Gold Corporation (“**Kaminak**”) for total consideration of approximately C\$530 million. Under the terms of the acquisition, each common share of Kaminak not already owned by us was exchanged for 0.10896 of a Common Share. Kaminak's key asset is the 100%-owned Coffee Project, a structurally hosted hydrothermal gold deposit located approximately 130 kilometres south of the City of Dawson, Yukon. The Coffee Project is a high-grade, open pit, heap leach mining project located in a stable mining jurisdiction.

Mr. Charles R. Sartain was appointed to the Board effective January 1, 2017. Following his appointment, the Board was comprised of 10 members.

On December 16, 2016, we announced that Mr. George Burns, our Executive Vice President and Chief Operating Officer, resigned from his position and Mr. Todd White, formerly our Senior Vice President, Technical Services and Business Excellence, was appointed Executive Vice President and Chief Operating Officer effective January 1, 2017.

2017

On February 17, 2017, we acquired New Gold Inc.'s 4% gold stream from future gold production on our 100% owned El Morro deposit for cash consideration of \$65 million. The El Morro deposit is part of the NuevaUnión Project, our 50/50 joint venture with Teck Resources Ltd. (“**Teck**”) that combines Teck's Relincho deposit and our El Morro deposits, which are located approximately 40 kilometres apart in the Huasco Province in the Atacama region of Chile.

On April 7, 2017, we completed the sale of our Los Filos mine to Leagold Mining Corporation (“**Leagold**”) for total consideration of \$347.5 million, after closing adjustments. The consideration was comprised of 25.3% of Leagold's then issued and outstanding common shares, with a value of \$71 million, \$247.5 million in cash and a \$29 million short-term promissory note that was due on the earlier of (i) 120 days from closing and (ii) the receipt by Leagold of approval from the Mexican competition commission of a subsequent tranche of its equity financing. We also retained rights to certain tax receivables of approximately \$100 million, all of which has been collected as at the date of this annual information form. In July 2017, Leagold received approval from the Mexican competition commission of a subsequent tranche of its equity financing and, as a result, our equity interest was reduced to 22.9% of Leagold's then issued and outstanding common shares and the \$29 million short-term promissory note was repaid.

On April 27, 2017, Mr. Peter Dey retired from our Board. Following his retirement, our Board was comprised of 9 members.

On May 31, 2017, we completed the sale of our Cerro Blanco project in Guatemala to Bluestone Resources Inc. (“**Bluestone**”) for total consideration of \$22 million, comprised of \$18 million in cash and common shares of Bluestone representing 4.9% of Bluestone's then issued and outstanding common shares. We will receive an additional \$15 million cash payment from Bluestone upon declaration of

commercial production at Cerro Blanco and a 1% net smelter return royalty on production.

On June 9, 2017, we completed the acquisition of a 50% interest in the Cerro Casale project (the “**Cerro Casale Transaction**”), located in the Maricunga Gold Belt in Chile. The Cerro Casale Transaction was executed in multiple steps, including our acquisition of a 25% interest in the Cerro Casale project from each of Kinross Gold Corporation (“**Kinross**”) and Barrick Gold Corporation (“**Barrick**”), which resulted in Barrick and Goldcorp each owning 50% of the project and subsequently forming a 50/50 joint operation. We acquired Kinross’ 25% interest in Cerro Casale and 100% interest in the Quebrada Seca exploration project for: (i) an initial cash payment of \$260 million, (ii) the granting of a 1.25% royalty interest to Kinross on 25% of gross revenues derived from metal production from Cerro Casale and Quebrada Seca, with Kinross foregoing the first \$10 million payable, (iii) a contingent payment of \$40 million payable after a construction decision at Cerro Casale, and (iv) the assumption of a \$20 million obligation to Barrick payable on commercial production at Cerro Casale. We acquired an additional 25% interest in Cerro Casale from Barrick for: (i) a deferred payment obligation of \$260 million to be satisfied through the funding of Barrick’s share of Cerro Casale expenditures, (ii) the granting of a 1.25% royalty interest to Barrick on 25% of gross revenues derived from metal production from Cerro Casale and Quebrada Seca, (iii) a contingent payment of \$40 million payable after a construction decision at Cerro Casale, and (iv) the transfer to Barrick of a 50% interest in Quebrada Seca, followed by the joint contribution by Goldcorp and Barrick of 100% of Quebrada Seca to the joint operation.

The joint operation, referred to as the Norte Abierto Project, includes a 100% interest in each of the Cerro Casale and Quebrada Seca projects and the Caspiche project (discussed below). We agreed with Barrick that 50% of Caspiche’s acquisition cost will be credited against our obligation to fund Barrick’s first \$260 million of shared expenditures under the joint operation. In addition, we will be required to spend a minimum of \$60 million in the two-year period following closing of the Cerro Casale Transaction, and a minimum of \$80 million in each successive two-year period until the deferred payment obligation is satisfied. If we do not spend the minimum in any two-year period, we will instead be required to make a payment to Barrick equal to 50% of the shortfall, with a corresponding reduction in the deferred payment obligation.

On July 26, 2017, Mr. Matthew Coon Come was appointed to our Board. Following his appointment, our Board was comprised of 10 members.

On August 2, 2017, we completed the acquisition of all of the outstanding shares of Exeter Resource Corporation (“**Exeter**”) for total consideration of approximately C\$207 million. Under the terms of the acquisition, each common share of Exeter not already owned by us was exchanged for 0.12 of a Common Share. Exeter’s key asset is the 100% owned Caspiche project, located within the Maricunga Gold Belt in Chile. Following the completion of the acquisition, we contributed the Caspiche project into the joint operation with Barrick, which resulted in Barrick and Goldcorp holding an indirect 50% interest in each of the Cerro Casale and Caspiche projects (now combined as the Norte Abierto Project).

On October 18, 2017, we completed the sale of our 21% interest in the San Nicolas copper-zinc project, a stand-alone project in Mexico, to Teck for cash consideration of \$50 million.

On October 26, 2017, Mr. Jason Attew, formerly our Senior Vice President, Corporate Development, was appointed our Executive Vice President, Chief Financial Officer and Corporate Development following the departure of Mr. Ball.

On November 7, 2017, we completed the sale of the Camino Rojo project to Orla Mining Ltd. (“**Orla**”), for consideration that included 19.9% of Orla’s then issued and outstanding common shares, with a value of \$34 million, and a 2% net smelter return royalty on revenues from all metal production from the Camino Rojo oxide project. We also have the option to acquire up to a 70% interest in future sulphide projects on the Camino Rojo property.

2018

On April 26, 2018, we announced that Ms. Blanca Treviño retired from our Board. Following Ms. Treviño's retirement, our Board was comprised of 9 members. Ms. Treviño agreed to maintain her involvement with Goldcorp and became a member of our International Advisory Committee which advises our Board.

On April 30, 2018 and June 5, 2018, respectively, we signed a Collaboration Agreement with Tr'ondëk Hwëch'on in relating to the Coffee project, and an Impacts and Benefits Agreement with three First Nation communities (Brunswick House First Nation, Chapleau Cree First Nation and Chapleau Ojibwe First Nation) with respect to the development and operation of the Borden project.

On June 20, 2018, affiliates of Goldcorp and Minera Frisco, S.A.B. de C.V. entered into a joint venture arrangement. The objective of the joint venture is to amalgamate and jointly explore exploration ground in the Mazapil Valley, near our Peñasquito Mine. By the end of the second quarter of 2018, drilling commenced on the first target, Santa Cruz, under the terms of the joint venture.

On October 24, 2018, Mrs. Cristina Bitar was appointed to our Board. Following her appointment, the size of our Board increased to 10 members.

On October 29, 2018, we announced the commencement of a Normal Course Issuer Bid (the "**NCIB**"). Under the NCIB, we may purchase for cancellation up to 43,476,502 Common Shares (representing 5% of the issued and outstanding Common Shares as at October 26, 2018) until October 30, 2019. All purchases made pursuant to the NCIB will be made through the facilities of the TSX, the NYSE, or other Canadian and United States market places.

On November 29, 2018, we announced that first gold had been achieved at Peñasquito's pyrite leach project ("**PLP**"), and commercial production was achieved in December. PLP is now processing 100% of the existing plant tailings.

Subsequent Events

On February 13, 2019, we reported our fourth quarter and full year 2018 results and announced that as a result of the Proposed Transaction, we recognized a non-cash impairment \$3.879 billion (net of tax) representing the difference between the book value of our shareholders' equity and the Newmont offer. The non-cash impairment was recorded entirely against the carrying values of the Peñasquito Mine, the Cerro Negro Mine, the Red Lake Mines and the Éléonore Mines.

On March 4, 2019, we announced that updated NI 43-101 technical reports had been filed for each of the Red Lake Mines and Éléonore Mine. See "Mineral Properties – Red Lake Mines, Canada" and "Mineral Properties – Éléonore Mines, Canada" for further details.

On March 7, 2019, we announced the signing of an integration agreement with Yamana Gold Inc. and Glencore International AG, pursuant to which the Agua Rica project would be developed and operated using the existing infrastructure and facilities of the Alumbra Mine. Following the full integration of the Agua Rica project and the Alumbra Mine, the parties respective ownership interest will be: Yamana (56.25%), Glencore (25%) and Goldcorp (18.75%).

Proposed Newmont Transaction

On January 14, 2019, we entered into an arrangement agreement with Newmont, as amended on February 19, 2019 (the "**Arrangement Agreement**"), pursuant to which, among other things, Newmont will acquire all of our issued and outstanding Common Shares. Under the terms of the Arrangement Agreement, our shareholders will receive, for each Common Share, (a) 0.3280 of a share of common stock of Newmont (a "**Newmont Share**") plus (b) US\$0.02 in cash. This exchange ratio represents a 17% premium to us based on the volume-weighted average price of Newmont Shares traded on the NYSE and Goldcorp shares traded on the NYSE, respectively, over the 20 trading days ended on January 11, 2019. Upon completion of the Proposed Transaction, we will be a wholly-owned subsidiary of Newmont.

The Proposed Transaction will be implemented by way of a court-approved plan of arrangement under the *Business Corporation Act* (Ontario) and is expected to close in the second quarter of 2019. Under certain circumstances, Newmont would be entitled to a \$350 million break-fee and we would be entitled to a \$650 million break-fee. The closing of the Proposed Transaction is subject to: approval by the shareholders of both companies; regulatory approvals in a number of jurisdictions including Canada, South Korea and Mexico; and other customary closing conditions. Please refer to our Circular for additional information. As of the date of this annual information form, the Proposed Transaction has received regulatory approvals from South Korea and Mexico.

Following the completion of the Proposed Transaction: (a) the name of Newmont will be changed to Newmont Goldcorp Corporation ("**Newmont Goldcorp**"); (b) our shareholders will own approximately 35% of the issued and outstanding shares of common stock of Newmont Goldcorp, and existing Newmont stockholders will own approximately 65% of the issued and outstanding shares of common stock of Newmont Goldcorp; (c) two-thirds of the board of directors of Newmont Goldcorp will be comprised of members of Newmont's existing board of directors and one-third of the board of directors will be comprised of members of our Board. Ms. Noreen Doyle, Newmont's Chair of the Board of Directors, will continue as the Chair of the Newmont Goldcorp Board of Directors. Mr. Ian Telfer, our Chairman of the Board of Directors, will not be joining the Newmont Goldcorp Board of Directors; and (d) Newmont Goldcorp will be listed on the NYSE and the TSX.

Further details regarding the terms of the Proposed Transaction are set out in the Circular, the Arrangement Agreement and the Material Change Report dated March 27, 2019, copies of which are available on our profile on SEDAR at www.sedar.com and on the United States Securities and Exchange Commission website at www.sec.gov.

DESCRIPTION OF THE BUSINESS

We are engaged in the acquisition, exploration, development, operation and reclamation of precious metal properties in Canada, the United States, Mexico, and Central and South America.

Principal Products

Our principal product is gold doré with the refined gold bullion sold primarily in the London spot market. As a result, we are not dependent on a particular purchaser with regard to the sale of gold doré. In addition to gold, we also produce silver, copper, lead and zinc primarily from concentrate produced at the Peñasquito Mine and Alumbra Mine, which is sold to third party smelters and refineries.

Competitive Conditions

The precious metal exploration and mining business is a competitive business. We compete with numerous other companies and individuals in the search for and the acquisition of financially attractive precious metal mineral properties. Our ability to acquire precious metal mineral properties in the future will depend not only on our ability to develop our present properties, but also on our ability to select and acquire suitable producing properties or prospects for precious metal development or mineral exploration.

In addition, we also compete with other companies over sourcing raw materials and supplies used in connection with our mining operations, as well as for skilled experienced workers. See “Risk Factors – Our failure to continue to source suppliers on reasonable commercial terms could have a material adverse effect on our business, results of operations and financial condition” and “Risk Factors – Our inability to attract and retain additional highly skilled employees may adversely affect our business and future operations”.

Operations

Raw Materials

We have (i) gold Mineral Reserves at the Red Lake Mines, the Porcupine Mine, the Musselwhite Mine, the Éléonore Mine, the Borden Project and the Coffee Project; (ii) gold and silver Mineral Reserves at the Cerro Negro Mine; (iii) gold and copper Mineral Reserves at the Norte Abierto Project; (iv) gold, copper and molybdenum Mineral Reserves at the NuevaUnión Project and the Alumbra Mine; (iv) gold, silver and copper Mineral Reserves at the Pueblo Viejo Mine; and (v) gold, silver, lead and zinc Mineral Reserves at the Peñasquito Mine.

Environmental Protection Requirements

Our mining, exploration and development activities are subject to various levels of federal, provincial, state and local laws and regulations relating to the protection of the environment, including requirements for closure and reclamation of mining properties.

The total provision for reclamation and closure cost obligations at December 31, 2018 was \$660 million and was calculated using a discount rate of 4.3%. The undiscounted value of this liability is \$1,961 million, calculated using an inflation rate assumption of 2.11%. Reclamation expenditures for the year ended December 31, 2018 were \$27 million. During the year ended December 31, 2018, we recognized a reduction of \$30 million in our provision to fund our share of Alumbra's reclamation and closure costs obligation. The reduction in the obligation reflects the expectation that Alumbra will be able to fund its reclamation costs using operating cash flows. As at December 31, 2018, the balance of the provision was \$nil.

See “Sustainability Policy” and “Environmental Matters” below and the disclosure regarding environmental matters under the respective descriptions of our material properties for further details regarding environmental matters.

Employees and Contractors

As at December 31, 2018, we had 7,980 employees and 7,519 contractors located worldwide, including people at our mines currently in closure. These numbers do not include employees and contractors at the Alumbra Mine and the Pueblo Viejo Mine of which we own 37.5% and 40%, respectively, but we are not the operator.

Our management believes that labor relations and community relations at all of our locations are generally good. There were some disruptions at our Peñasquito Mine and Cerro Negro Mine in 2018, however they did not impact overall business targets. In line with our mission of “*Together Creating Sustainable Value*”, we continue to work on the continuous improvement of relationships with our key stakeholders.

There remains demand for highly skilled, experienced and diverse workers in our industry despite the ongoing volatility in the resource industry. See “Risk Factors – Our inability to attract and retain additional highly skilled employees may adversely affect our business and future operations” below.

Foreign Operations

We currently own or have an interest in mining operations and development projects in Argentina, Chile, the Dominican Republic and Mexico. Our operations are exposed to various levels of political, economic and social risks and uncertainties. These risks and uncertainties vary from country to country and include, but are not limited to: terrorism; hostage taking; military repression; expropriation; political corruption, extreme fluctuations in currency exchange rates; high rates of inflation; labour unrest; war or civil unrest; renegotiation or termination of existing concessions, licenses, permits and contracts; ability of governments to unilaterally alter agreements; surface land access issues; illegal mining; changes in taxation policies, laws and regulations; restrictions on foreign exchange and repatriation; and changing political conditions, currency controls and governmental regulations that favour or require the awarding of contracts to local contractors or require foreign contractors to employ citizens of, or purchase supplies from, a particular jurisdiction. Any changes in regulations or shifts in political attitudes in such foreign countries are beyond our control and may adversely affect our business. Future development and operations may be affected in varying degrees by such factors as government regulations (or changes thereto) with respect to restrictions on production, export controls, import restrictions, such as restrictions applicable to, among other things, equipment, services and supplies, taxes, expropriation of property, repatriation of profits, environmental legislation, land use, water use, surface land access, land claims of local people and mine safety. The effect of these factors cannot be accurately predicted. See “Risk Factors” below.

Sustainability

In 2018, as part of the annual continuous improvement cycle, we reviewed and updated where appropriate our Sustainability Excellence Management System (“**SEMS**”), an integrated management system containing performance standards for safety and health, environment, corporate social responsibility and security. The SEMS is integrated into our core business functions, and emphasizes sustainability, responsibility and accountability at all organizational levels. Performance standards covering all activities that have the potential to affect the sustainability of our properties and the communities in which we operate are an integral part of the SEMS.

The SEMS audit cycle was designed to streamline SEMS audit activities at a frequency based on risk, but not less frequent than once every three years at operating sites. In 2018, SEMS audits were conducted at the following five mine sites by a team that was independent of the operation being audited: Red Lake; Cerro Negro; Porcupine; Éléonore and Peñasquito. The SEMS audit evaluated compliance with key regulatory and permit requirements, and compliance with the SEMS standards.

Sustainability Policy

In 2018, we issued a new Sustainability policy (the “**Sustainability Policy**”), which combines the former Occupational Health & Safety, Corporate Social Responsibility, and Environmental and Sustainability policies. The Sustainability Policy states our commitment to: the health and safety of our workers and communities, the protection of the environment, and to the rights, culture and development of local and Indigenous communities. The Sustainability Policy also acts as the guiding document for our SEMS. It represents an important step in streamlining our efforts to ensure coordination and consistency across the different departments that encompass sustainability at Goldcorp.

The Sustainability Committee of the Board is responsible for overseeing the Sustainability Policy. The Sustainability Policy is available on our website at www.goldcorp.com.

Safety Commitment

Our vision of making Goldcorp “Safe Enough for Our Families” is well understood by our employees and we continue to advance safety performance across all regions of our operations and projects. At the end of 2018, we demonstrated improvement in our safety performance as measured by the frequency of reportable incidents. The “All Injuries Frequency Rate” improved by 10% and the “Lost Time Injury Frequency Rate” improved by 35% since 2017.

Our focus in 2019 continues to be to further reduce the impact of our work on the health and safety of the workforce by focusing on those risks identified through formal processes, further advancing the quality and communication of incident investigations, and continuing to drive accountability for safety performance at all levels of the organization. We strive to improve our safety record and, as a result of analyses, have put additional focus on several key areas, including: (a) improving the quality of employee engagements through coaching and feedback reviews (planned interactions in the field between managers and employees); (b) improving risk identification and communication across Goldcorp, with a focus on control management and verification; (c) improving the quality of incident investigations and dissemination of findings; and (d) requiring all workers to carry and use the “Golden Guide” and adopting the 5-point safety card for all work assignments. The Golden Guide is a work-planning tool to be used for all jobs, routine and non-routine, to assess the risks and control actions to be incorporated into the planning for such jobs. The 5-point card has been in use for over 40 years in underground mining in Canada – it is a workplace risk assessment and hazard identification tool as well as a tool used to enrich a safety conversation in the work area.

In 2018, we continued to advance our Leadership Engagement and Accountability program called “Step-In”. The program is centered on defining and demonstrating the site standard for safe production and how to engage employees in safety. The focus in 2018 continued to be on the quality of engagements through coaching and formal feedback mechanisms. In addition, we enhanced our ability to deliver high quality incident investigations by developing the Goldcorp Certified Investigator program. The program teaches investigators advanced incident investigation techniques and offers tools such as the Investigator’s Handbook that will help guide the investigation process across our company. Each site will receive training in the Goldcorp Certified Investigator program in 2019. We also continued our focus in 2018 around industrial hygiene and occupational health, by further quantifying those risks at each of our sites and creating a basis for controlling occupational exposure.

Beginning in July 2015, we established targets and started to collect metrics on employee engagements by managers and senior leaders at mine sites. In 2018, our site management completed over 170,000 employee engagements.

Our continued focus in 2018 on “Potential Fatal Occurrences” (“**PFO**”) has helped reduce fatal risks across the company by creating a more rigorous and objective classification method. The number of PFOs we reported in 2018 was reduced by 38%. Ensuring that PFOs are correctly and objectively classified is a crucial component to reducing fatal risks. As the PFO process matures, our workforce is improving its ability to identify high risk activities before they lead to an incident. We share the lessons learned as a result of the thorough investigations of PFOs to avoid the potential recurrence of similar incidents. In 2019, we will continue to advance our efforts to reduce fatal risks by further refining the PFO classification, investigation and communication systems already in place.

Corporate Social Responsibility

During 2018, we continued to implement components of our corporate social responsibility framework at all of our operating sites and projects, including: socio-economic baseline studies, stakeholder mapping and prioritization and upgraded grievance mechanisms. In addition, some of our noteworthy corporate social responsibility activities and initiatives included:

- *United Nations Global Compact (“UN Global Compact”)* – The UN Global Compact is a strategic policy initiative for businesses that are committed to aligning their operations and strategies with ten universally accepted principles in the areas of human rights, labour, environment and anti-corruption. In 2009, we became a signatory to the UN Global Compact.
- *International Council on Mining and Metals (“ICMM”)* – The ICMM is a collaborative organization comprised of mining and metals companies and associations working together on sustainability-related issues important to the mining industry, of which we are a member. The ICMM is a contributor to sustainable development and requires members to perform based on principles of sustainable development.
- *Global Reporting Initiative (“GRI”)* – The GRI is intended to serve as a generally accepted framework for reporting on an organization’s economic, environmental, social and health and safety performance. The GRI Reporting Framework contains general and sector-specific content applicable for reporting an organization’s sustainability performance. We have committed to using the GRI as the basis for our sustainability reporting and have been reporting to and against the GRI since 2007. In 2017, we initiated transition from G4 Sustainability Reporting Guidelines to GRI Standards. Earlier adoption of the GRI Standards is encouraged and all key concepts and most disclosures from G4 have carried through to the GRI Standards. Under the GRI Standards, companies must focus their sustainability reporting on topics that are material to them and their stakeholders.
- *Extractive Industries Transparency Initiative (“EITI”)* – The EITI is a partnership of governments, international organizations, companies, non-governmental organizations, investors and business and industrial organizations with the aim to strengthen governance by improving transparency in transactions between governments and companies in the extractive industries. This transparency will in turn improve public awareness of the revenues from these industries, increasing the likelihood that they will contribute to sustainable development and poverty reduction. We are an active supporter of the EITI through our membership in the ICMM and individual corporate action. In countries where governments have indicated a desire to be a part of the process, we are actively involved in contributing to the success of the initiative.
- *World Gold Council’s Conflict-Free Gold Standard (“CFGS”)* – Developed by the World Gold Council with extensive input from gold producers, governments, civil society and supply chain participants, the CFGS establishes a common approach by which gold producers can assess and provide assurance that their gold has been extracted in a manner that does not cause, support or benefit unlawful armed conflict or contribute to serious human rights abuses or breaches of international humanitarian law. The CFGS was published in October 2012 and is designed to apply to World Gold Council member companies and other entities involved in the extraction of gold. We implemented the CFGS on a company-wide basis effective January 1, 2013 and publish our Conflict-Free Gold Report on an annual basis. Conformance with the CFGS is company-wide

and is externally assured. In 2018, we continued to focus our efforts on our Peñasquito Mine, which is considered to be in a higher-risk area. In 2018, our assurance statement confirmed that all gold and gold-bearing material produced at mining operations where we operate have the appropriate systems and controls in place to conform to the World Gold Council's Conflict-Free Gold Standard. The application of CFGS has also assisted us in continuing to implement practices aligned with the Voluntary Principles (as defined below).

Environmental Matters

Our properties are managed by staff to comply with internal standards, and legal environmental requirements. Additionally, our properties are inspected periodically by regulatory authorities to ensure that such properties are in compliance with applicable environmental laws and regulations, or to monitor any corrective actions necessary to achieve compliance. Our properties are also periodically audited by our employees or external experts to verify compliance with internal standards or to identify where any gaps may exist that require corrective actions.

As part of our goal to minimize any negative environmental or social impacts from our projects and operations, we develop closure plans as part of our initial project planning and design. If we acquire a property that lacks a closure plan, we require the preparation of a closure plan. As part of our annual strategic business planning, we identify the significant environmental risks and review and update the closure costs for each property to account for additional knowledge acquired with respect to a property or for changes in applicable laws or regulations. This process ensures that we properly budget for the costs associated with closure and with implementing appropriate sustainability management measures.

In addition to the initiatives described above under "Corporate Social Responsibility", and consistent with the Sustainability Policy and the SEMS, an additional initiative of particular importance to us relating to the protection of communities, the environment and the safety of our employees is our participation in the International Cyanide Management Code (the "**Cyanide Code**"). The Cyanide Code is a voluntary industry program for companies involved in the production of gold by the cyanidation process. The Cyanide Code addresses the production of cyanide, its transport from the producer to the mine, its on-site storage and use, decommissioning and financial assurance, worker safety, emergency response, training, stakeholder involvement and verification of implementation of the Cyanide Code. In 2007, we became a signatory to the Cyanide Code, and all of our operating mines are certified compliant with the Cyanide Code.

Human Rights Policy

Our human rights policy (the "**Human Rights Policy**") requires the integration of human rights best practices into all of our business and decision-making processes. The Human Rights Policy mandates that we operate in a way that respects the human rights of employees and of the members of the communities in which we operate. International humanitarian laws were consulted in developing the Human Rights Policy and it includes our pledge to seek to establish constructive dialogues and partnerships with a variety of stakeholders on human rights performance. Our Human Rights Policy recognizes that while governments have the primary responsibility to protect human rights, our activities have the potential to impact the human rights of individuals affected by our business operations. As such, the Human Rights Policy provides that we will seek constructive dialogues and partnerships with a variety of stakeholders on our human rights performance, especially those impacted directly by our operations. In 2017, as part of our commitment to increasing awareness of our human rights commitments, we extended our human rights training tools to key contractors and delivered internal human rights training targeted at department managers for key sites in Latin America.

The Human Rights Policy reflects the changing social context in which we operate and defines our practices and commitments on human rights. Recent additions to this policy include clauses on community consultation; grievance mechanisms; commitment to the CFGS; commitment to respect the rights, interests, perspectives, and traditions of Indigenous Peoples; resettlement planning; and potential measures in the event of non-compliance.

The Voluntary Principles on Security and Human Rights (the “**Voluntary Principles**”) are a set of voluntary principles developed by the governments of the United States and the United Kingdom, companies in the extractive and energy sectors and non-governmental organizations to guide companies in maintaining the safety and security of their operations within an operating framework that ensures respect for human rights and fundamental freedoms. In 2016, we formally became a signatory of the Voluntary Principles. As a signatory, we are required to implement the principles across all of our operations and will improve our alignment of corporate policies and procedures with internationally recognized human rights principles in the provision of security for our operations.

In 2017, we performed assessments of the Voluntary Principles at several Latin American sites. In accordance with the Voluntary Principles, during 2017, all security staff received at least one pre-shift briefing per month on the use of force and additional training on respecting human rights. Our security supervisors provided ongoing training and refresher classes. Ongoing Human Rights on-line training also continued during 2018 for our employees. Non-compliance with our human rights requirements is not tolerated.

The Sustainability Committee of the Board is responsible for overseeing the Human Rights Policy. The Human Rights Policy is available on our website at www.goldcorp.com.

Diversity and Inclusion Policy

Under our diversity and inclusion policy (the “**D&I Policy**”), we recognize the benefits arising from employee and Board diversity, including a broader pool of high-quality employees, improving employee retention, accessing different perspectives and ideas and benefiting from all available talent. The D&I Policy promotes the benefits of, and need for, extending opportunities for career advancement to all of our workforce and outside candidates, without distinction. The D&I Policy is available on our website at www.goldcorp.com.

At Goldcorp, we define “**Diversity**” as any dimension that can be used to differentiate groups and people from one another, including but not limited to, sex, gender, age, ethnic origin, religion, education, sexual orientation, political belief, disability and family status. “**Inclusion**” refers to a culture of respect and appreciation of these differences.

We strive to foster an open and inclusive workplace environment and strongly support the principle that all individuals should have an equal opportunity to participate in our company and achieve their full potential. In compliance with our Code of Conduct and the D&I Policy, directors, officers, employees and contractors will:

1. Always treat each other and all members of the outside community with respect and courtesy.
2. Always keep our workplace free from all forms of harassment, meaning unwelcome behaviour that a reasonable person would consider to be degrading, humiliating, discriminatory or intimidating.
3. Never permit factors like race, religion, colour, sex, sexual orientation, age, nationality or ethnicity to determine decisions about hiring, employment promotions, pay rates, transfers, layoffs or terminations (or condone decisions by others determined by such factors).
4. Never permit physical disabilities to determine work-related decisions, unless the disability prevents a person from safely doing a job and the disability cannot be reasonably accommodated.
5. Foster a culture of diversity and inclusion, where different perspectives, experiences and skillsets are respected and valued.

Notable achievements in 2018 included:

Diversity and Inclusion Strategy: Our Diversity and Inclusion Committee continued to promote Diversity and Inclusion across Goldcorp and focus efforts to enhance our inclusive workplace. A key initiative of the

Committee in 2018 was the rollout of our multi-year Diversity and Inclusion Strategy which was developed in 2017 (the “**D&I Strategy**”). The D&I Strategy takes a broad view of Diversity and identifies ways to enhance our inclusive business practices and work environment. We are measuring the progress of our D&I Strategy with the Global Diversity and Inclusion Benchmarks¹, which rank inclusive practices on a five-point maturity scale from 1 ‘Inactive’ to 5 ‘Best Practice’. We are pleased to report that in 2018, we moved positively along the Global Diversity and Inclusion Benchmarks, increasing our average ranking from Level 2 ‘Reactive’, to Level 2.9, just below Level 3 ‘Proactive’. Our progress on the D&I Strategy is reported to the Human Resources and Compensation Committee of the Board on a quarterly basis. The D&I Strategy is supported by a network of diversity and inclusion champions at each site, project and office and include Mine General Managers and other managers in departments such as Human Resources and Corporate Social Responsibility and others. Diversity and inclusion champions meet once every two months to share ideas and provide updates on their progress.

Unconscious Bias Awareness Training: An Unconscious Bias awareness training program was completed by over 400 mid-level managers and supervisors across our company. The training raises awareness and deepens understanding of unconscious bias in the workplace and provides strategies for disrupting and overcoming bias. Since 2016, this interactive training has been delivered to the Executive Leadership Team, all senior management including Senior Vice Presidents, Vice Presidents, Mine General Managers and employees in middle-management positions across our company.

Creating Choices Suite of Programs: To ensure gender diversity throughout our organization, we promote our acclaimed, enterprise-wide training, development and mentorship initiative for women at Goldcorp, entitled “Creating Choices”. In 2018, in support of our commitment to Inclusion, we launched a Gender Inclusive Creating Choices program, so employees of all genders, can benefit from the leadership communication skills offered through the Creating Choices suite of programs. The programs strengthen the ability of our employees to: (i) understand opportunities for personal and professional growth; (ii) develop their self-confidence and courage; (iii) build strong partnerships with fellow employees and communities where we operate; (iv) gain access to mentoring; and (v) receive recognition for their contributions to Goldcorp. To date, over 2,000 employees have graduated from the Creating Choices suite of programs which are taught by trained facilitators at our sites, projects and offices. In 2018, we also rolled out the third installment of the Creating Choices suite of programs, “Future Choices”, which equips employees for sustainable success, long after mine closure. The four modules of the Future Choices program provide insights on entrepreneurship, basic financial concepts, self-confidence and change management skills to ensure employees continue to lead and succeed in their communities, long after mining operations have ceased.

Gender Diversity Initiatives: We continued our commitment with the 30% Club Canada and the Catalyst Accord 2022² to increase the average percentage of women on boards and women in executive positions in corporate Canada to 30% or greater by 2022, and share key metrics with Catalyst to benchmark collective progress towards these goals. As of December 31, 2018, our Board was comprised of 30% women and 21% of our officers were women. By pledging to accelerate or maintain (where already strong) the representation of women on our Board and in executive positions by 2022, we are making our commitment to Diversity and Inclusion visible to our employees and shareholders. Furthermore, we actively support the Women’s Executive Network and the Canadian Board Diversity Council which are members of the Phasenyne network of companies. In 2018, we also supported the first ever International Women in Resources Mentorship Program³, and in 2019, employees will participate in the program as mentees and mentors. In 2019, we will remain actively committed to pursuing and developing ongoing diversity initiatives at Goldcorp.

¹ O’Mara, Julie, and Richter, Alan, Global Diversity & Inclusion Benchmarks (www.diversitycollegium.org, 2016), PDF.

² The Catalyst Accord 2022 is a call to action for Canadian corporations to increase the average percentage of women on boards and women in executive positions in corporate Canada to 30% or greater by 2022; and share key metrics with Catalyst for annual benchmarking of our collective progress.

³ <https://www.iwrmp.com/>

In addition, we also have policies that promote and support Diversity and Inclusion, such as: the Code of Conduct; the Sustainability Policy; the Employee Assistance Program; the Respect in the Workplace Policy; and the Human Rights Policy, among others.

Anti-Bribery and Anti-Corruption Policy

Our anti-bribery and anti-corruption policy (the “**Anti-Bribery and Anti-Corruption Policy**”) outlines the requirements that must be fulfilled by all our employees, officers and directors, as well as by any third party working for or acting on our behalf. These requirements include prohibitions against bribing government officials, making facilitation payments and commercial bribery.

The Anti-Bribery and Anti-Corruption Policy also provides employees with clarity regarding: books and records transparency; giving gifts to government officials; making political or charitable contributions; third party oversight and due diligence; internal controls; and management's responsibility to promote an ethical tone from the top and create awareness of the policy.

Technical Information

CIM Definition Standards

The Mineral Reserves and Mineral Resources estimations for the Red Lake Mines, Porcupine Mine, Musselwhite Mine, Eléonore Mine, Peñasquito Mine, Cerro Negro Mine, Pueblo Viejo Mine, Coffee Project, NuevaUnión Project, Norte Abierto Project, and Noche Buena Project have been prepared in accordance with the CIM Definition Standards that are incorporated by reference in NI 43-101. The following definitions are reproduced from the CIM Definition Standards:

A “**Mineral Resource**” is a concentration or occurrence of solid material of economic interest in or on the Earth's crust in such form, grade or quality and quantity that there are reasonable prospects for eventual economic extraction. The location, quantity, grade or quality, continuity and other geological characteristics of a Mineral Resource are known, estimated or interpreted from specific geological evidence and knowledge, including sampling. Mineral Resources are sub-divided, in order of increasing geological confidence, into Inferred, Indicated and Measured categories.

An “**Inferred Mineral Resource**” is that part of a Mineral Resource for which quantity and grade or quality are estimated on the basis of limited geological evidence and sampling. Geological evidence is sufficient to imply but not verify geological and grade or quality continuity. An Inferred Mineral Resource has a lower level of confidence than that applying to an Indicated Mineral Resource and must not be converted to a Mineral Reserve. It is reasonably expected that the majority of Inferred Mineral Resources could be upgraded to Indicated Mineral Resources with continued exploration.

An “**Indicated Mineral Resource**” is that part of a Mineral Resource for which quantity, grade or quality, densities, shape and physical characteristics are estimated with sufficient confidence to allow the application of Modifying Factors (as defined below) in sufficient detail to support mine planning and evaluation of the economic viability of the deposit. Geological evidence is derived from adequately detailed and reliable exploration, sampling and testing and is sufficient to assume geological and grade or quality continuity between points of observation. An Indicated Mineral Resource has a lower level of confidence than that applying to a Measured Mineral Resource and may only be converted to a Probable Mineral Reserve.

A “**Measured Mineral Resource**” is that part of a Mineral Resource for which quantity, grade or quality, densities, shape, and physical characteristics are estimated with confidence sufficient to allow the application of Modifying Factors to support detailed mine planning and final evaluation of the economic viability of the deposit. Geological evidence is derived from detailed and reliable exploration, sampling and testing and is sufficient to confirm geological and grade or quality continuity between points of observation. A Measured Mineral Resource has a higher level of confidence than that applying to either an Indicated Mineral Resource or an Inferred Mineral Resource. It may be converted to a Proven Mineral Reserve or to a Probable Mineral Reserve.

A “**Mineral Reserve**” is the economically mineable part of a Measured and/or Indicated Mineral Resource. It includes diluting materials and allowances for losses, which may occur when the material is mined or extracted and is defined by studies at pre-feasibility or feasibility level as appropriate that include application of Modifying Factors. Such studies demonstrate that, at the time of reporting, extraction could reasonably be justified. The reference point at which Mineral Reserves are defined, usually the point where the ore is delivered to the processing plant, must be stated. It is important that, in all situations where the reference point is different, such as for a saleable product, a clarifying statement is included to ensure that the reader is fully informed as to what is being reported. The public disclosure of a Mineral Reserve must be demonstrated by a pre-feasibility study or feasibility study.

A “**Probable Mineral Reserve**” is the economically mineable part of an Indicated, and in some circumstances, a Measured Mineral Resource. The confidence in the Modifying Factors applying to a Probable Mineral Reserve is lower than that applying to a Proven Mineral Reserve.

A “**Proven Mineral Reserve**” is the economically mineable part of a Measured Mineral Resource. A Proven Mineral Reserve implies a high degree of confidence in the Modifying Factors.

For the purposes of the CIM Definition Standards, “**Modifying Factors**” are considerations used to convert Mineral Resources to Mineral Reserves. These include, but are not restricted to, mining, processing, metallurgical, infrastructure, economic, marketing, legal, environmental, social and governmental factors.

JORC Code Definitions

The Ore Reserves and Mineral Resources estimations for the Alumbrera Mine have been prepared in accordance with the current version of the Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves (the “**JORC Code**”), the Australian worldwide standards. The JORC Code has been accepted for current disclosure rules in Canada under NI 43-101. The following definitions are reproduced from the JORC Code:

A “**Mineral Resource**” is a concentration or occurrence of solid material of economic interest in or on the Earth’s crust in such form, grade (or quality), and quantity that there are reasonable prospects for eventual economic extraction. The location, quantity, grade (or quality), continuity and other geological characteristics of a Mineral Resource are known, estimated or interpreted from specific geological evidence and knowledge, including sampling. Mineral Resources are sub-divided, in order of increasing geological confidence, into Inferred, Indicated and Measured categories.

An “**Inferred Mineral Resource**” is that part of a Mineral Resource for which quantity and grade (or quality) are estimated on the basis of limited geological evidence and sampling. Geological evidence is sufficient to imply but not verify geological and grade (or quality) continuity. It is based on exploration, sampling and testing information gathered through appropriate techniques from locations such as outcrops, trenches, pits, workings and drill holes. An Inferred Mineral Resource has a lower level of confidence than that applying to an Indicated Mineral Resource and must not be converted to an Ore Reserve. It is reasonably expected that the majority of Inferred Mineral Resources could be upgraded to Indicated Mineral Resources with continued exploration.

An “**Indicated Mineral Resource**” is that part of a Mineral Resource for which quantity, grade (or quality), densities, shape and physical characteristics are estimated with sufficient confidence to allow the application of Modifying Factors in sufficient detail to support mine planning and evaluation of the economic viability of the deposit. Geological evidence is derived from adequately detailed and reliable exploration, sampling and testing gathered through appropriate techniques from locations such as outcrops, trenches, pits, workings and drill holes, and is sufficient to assume geological and grade (or quality) continuity between points of observation where data and samples are gathered. An Indicated Mineral Resource has a lower level of confidence than that applying to a Measured Mineral Resource and may only be converted to a Probable Ore Reserve.

A “**Measured Mineral Resource**” is that part of a Mineral Resource for which quantity, grade (or quality), densities, shape, and physical characteristics are estimated with confidence sufficient to allow the

application of Modifying Factors to support detailed mine planning and final evaluation of the economic viability of the deposit. Geological evidence is derived from detailed and reliable exploration, sampling and testing gathered through appropriate techniques from locations such as outcrops, trenches, pits, workings and drill holes, and is sufficient to confirm geological and grade (or quality) continuity between points of observation where data and samples are gathered. A Measured Mineral Resource has a higher level of confidence than that applying to either an Indicated Mineral Resource or an Inferred Mineral Resource. It may be converted to a Proved Ore Reserve or under certain circumstances to a Probable Ore Reserve.

An “**Ore Reserve**” is the economically mineable part of a Measured and/or Indicated Mineral Resource. It includes diluting materials and allowances for losses, which may occur when the material is mined or extracted and is defined by studies at pre-feasibility or feasibility level as appropriate that include application of Modifying Factors. Such studies demonstrate that, at the time of reporting, extraction could reasonably be justified. The reference point at which Reserves are defined, usually the point where the ore is delivered to the processing plant, must be stated. It is important that, in all situations where the reference point is different, such as for a saleable product, a clarifying statement is included to ensure that the reader is fully informed as to what is being reported.

A “**Probable Ore Reserve**” is the economically mineable part of an Indicated, and in some circumstances, a Measured Mineral Resource. The confidence in the Modifying Factors applying to a Probable Ore Reserve is lower than that applying to a Proved Ore Reserve.

A “**Proved Ore Reserve**” is the economically mineable part of a Measured Mineral Resource. A Proved Ore Reserve implies a high degree of confidence in the Modifying Factors

For the purposes of the JORC Code, “**Modifying Factors**” are considerations used to convert Mineral Resources to Ore Reserves. These include, but are not restricted to, mining, processing, metallurgical, infrastructure, economic, marketing, legal, environmental, social and governmental factors.

The foregoing definitions of Ore Reserves and Mineral Resources as set forth in the JORC Code have been reconciled to the definitions set forth in the CIM Definition Standards. If the Ore Reserves and Mineral Resources for the Alumbrera Mine were estimated in accordance with the definitions in the CIM Definition Standards, there would be no substantive difference in such Ore Reserves and Mineral Resources.

Summary of Ore Reserve/Mineral Reserve and Mineral Resource Estimates

The following table sets forth the gold, silver, copper, lead, zinc and molybdenum Ore Reserve/Mineral Reserve estimates for each of the Red Lake Mines, Porcupine Mine, Musselwhite Mine, Eléonore Mine, Peñasquito Mine, Cerro Negro Mine, Alumbrera Mine (37.5%), Pueblo Viejo Mine (40%), NuevaUnión Project (50%), Norte Abierto Project (Casale deposit, 50%) and Coffee Project, effective December 31, 2018 unless otherwise indicated:

	PROVEN			PROBABLE			PROVEN & PROBABLE		
	Tonnage <i>mt</i>	Grad <i>g/t</i>	Contained <i>m oz</i>	Tonnage <i>mt</i>	Grade <i>g/t</i>	Contained <i>m oz</i>	Tonnage <i>mt</i>	Grade <i>g/t</i>	Contained <i>m oz</i>
Gold									
Alumbrera	25.28	0.39	0.32	0.90	0.37	0.01	26.18	0.39	0.33
Cerro Casale	114.85	0.65	2.39	483.95	0.59	9.23	598.80	0.60	11.62
Cerro Negro	3.68	8.11	0.96	14.15	8.92	4.06	17.83	8.75	5.02
Coffee	11.68	1.47	0.55	25.23	1.37	1.11	36.91	1.40	1.67
Eléonore	3.65	5.97	0.70	14.14	5.61	2.55	17.78	5.69	3.25
Musselwhite	3.59	6.57	0.76	7.31	6.46	1.52	10.91	6.49	2.28
NuevaUnión	166.80	0.55	2.96	121.58	0.38	1.50	288.37	0.48	4.46
Peñasquito	376.43	0.58	6.97	143.99	0.46	2.15	520.41	0.55	9.12
Porcupine	13.42	1.64	0.71	216.71	1.07	7.42	230.13	1.10	8.13
Pueblo Viejo	41.09	2.56	3.38	10.07	3.05	0.99	51.16	2.66	4.37
Red Lake	1.53	10.24	0.50	7.66	6.30	1.55	9.19	6.95	2.05
Totals	761.98	0.82	20.21	1,045.69	0.95	32.09	1,807.67	0.90	52.30
Silver	<i>mt</i>	<i>g/t</i>	<i>m oz</i>	<i>mt</i>	<i>g/t</i>	<i>m oz</i>	<i>mt</i>	<i>g/t</i>	<i>m oz</i>
Cerro Casale	114.85	1.91	7.04	483.95	1.43	22.30	598.80	1.52	29.34
Cerro Negro	3.68	63.43	7.51	14.15	60.88	27.69	17.83	61.40	35.20
Peñasquito	376.43	34.56	418.32	143.99	23.60	109.26	520.41	31.53	527.58
Pueblo Viejo	41.09	17.59	23.24	10.07	14.81	4.80	51.16	17.04	28.03
Totals	536.05	26.47	456.11	652.16	7.82	164.05	1,188.21	16.23	620.16
Copper	<i>mt</i>	<i>%</i>	<i>m lbs</i>	<i>mt</i>	<i>%</i>	<i>m lbs</i>	<i>mt</i>	<i>%</i>	<i>m lbs</i>
Alumbrera	25.28	0.40	222.89	0.90	0.38	7.54	26.18	0.40	230.43
Cerro Casale	114.85	0.19	480.87	483.95	0.23	2,408.87	598.80	0.22	2,889.73
NuevaUnión	442.92	0.43	4,212.42	571.49	0.38	4,755.93	1,014.41	0.40	8,968.35
Totals	583.04	0.38	4,916.17	1,056.34	0.31	7,172.34	1,639.38	0.33	12,088.51
Lead	<i>mt</i>	<i>%</i>	<i>m lbs</i>	<i>mt</i>	<i>%</i>	<i>m lbs</i>	<i>mt</i>	<i>%</i>	<i>m lbs</i>
Peñasquito	372.77	0.34	2,803.62	143.55	0.26	809.58	516.32	0.32	3,613.20
Totals	372.77	0.34	2,806.62	143.55	0.26	809.58	515.32	0.32	3,613.20
Zinc	<i>mt</i>	<i>%</i>	<i>m lbs</i>	<i>mt</i>	<i>%</i>	<i>m lbs</i>	<i>mt</i>	<i>%</i>	<i>m lbs</i>
Peñasquito	372.77	0.77	6,314.23	143.55	0.53	1,680.30	516.32	0.70	7,994.53
Totals	372.77	0.77	6,314.23	143.55	0.53	1,680.30	516.32	0.70	7,994.53
Molybdenum	<i>mt</i>	<i>%</i>	<i>m lbs</i>	<i>Mt</i>	<i>%</i>	<i>m lbs</i>	<i>mt</i>	<i>%</i>	<i>m lbs</i>
NuevaUnión	276.12	0.014	86.10	449.92	0.017	171.87	726.03	0.016	257.98
Totals	276.12	0.014	86.10	449.92	0.017	171.87	726.03	0.016	257.98

The following table sets forth the gold, silver, copper, lead, zinc and molybdenum Mineral Resource estimates for each of the Red Lake Mines, Porcupine Mine, Musselwhite Mine, Éléonore Mine, Peñasquito Mine, Cerro Negro Mine, Alumbrera Mine (37.5%), Pueblo Viejo Mine (40%), NuevaUnión Project (50%), Norte Abierto Project (Casale and Caspiche deposits, 50%), Noche Buena Project and Coffee Project, effective December 31, 2018 unless otherwise indicated:

	MEASURED			INDICATED			MEASURED & INDICATED			INFERRED		
	Tonnage	Grade	Contained	Tonnage	Grade	Contained	Tonnage	Grade	Contained	Tonnage	Grade	Contained
Gold	mt	g/t	m oz	mt	g/t	m oz	mt	g/t	m oz	mt	g/t	m oz
Alumbrera	20.40	0.34	0.22	5.70	0.53	0.10	26.10	0.38	0.32	2.66	0.45	0.04
Caspiche	310.05	0.57	5.65	391.75	0.47	5.97	701.80	0.51	11.62	99.05	0.29	0.92
Cerro Casale	11.48	0.30	0.11	136.85	0.36	1.57	148.32	0.35	1.69	247.72	0.38	3.00
Cerro Negro	1.12	4.53	0.16	6.34	5.35	1.09	7.46	5.23	1.25	1.13	4.63	0.17
Coffee	1.81	1.22	0.07	22.24	0.94	0.67	24.05	0.96	0.74	34.45	0.84	0.94
Éléonore	0.79	6.15	0.16	2.39	4.67	0.36	3.18	5.03	0.51	3.19	5.76	0.59
Musselwhite	0.29	5.48	0.05	1.90	4.55	0.28	2.20	4.67	0.33	5.17	5.19	0.86
Noche Buena	-	-	-	27.50	0.37	0.33	27.50	0.37	0.33	2.47	0.22	0.02
NuevaUnión	0.19	0.47	0.00	26.42	0.85	0.72	26.62	0.85	0.72	188.52	0.55	3.34
Peñasquito	94.03	0.25	0.76	104.77	0.24	0.81	198.80	0.25	1.57	14.88	0.30	0.14
Porcupine	32.70	1.23	1.30	229.90	0.96	7.11	262.60	1.00	8.41	113.03	1.03	3.74
Pueblo Viejo	5.08	2.39	0.39	62.49	2.47	4.96	67.57	2.46	5.35	18.40	2.43	1.43
Red Lake	1.52	18.15	0.89	3.78	13.50	1.64	5.30	14.83	2.53	4.93	15.10	2.39
Totals	479.46	0.63	9.76	1,022.03	0.78	25.61	1,501.49	0.73	35.37	735.61	0.74	17.58
Silver	mt	g/t	m oz	mt	g/t	m oz	mt	g/t	m oz	mt	g/t	m oz
Caspiche	310.05	1.20	11.98	391.75	1.20	15.15	701.80	1.20	27.12	99.05	0.91	2.91
Cerro Casale	11.48	1.19	0.44	136.85	1.06	4.66	148.32	1.07	5.10	247.72	1.04	8.25
Cerro Negro	1.12	41.33	1.49	6.34	36.01	7.34	7.46	36.81	8.83	1.13	25.04	0.91
Noche Buena	-	-	-	27.50	12.35	10.92	27.50	12.35	10.92	2.47	8.08	0.64
Peñasquito	94.03	28.33	85.65	104.77	22.76	76.67	198.80	25.40	162.31	14.88	13.47	6.44
Pueblo Viejo	5.08	14.28	2.33	62.49	13.60	27.32	67.57	13.65	29.65	18.40	10.80	6.39
Totals	421.76	7.51	101.89	729.69	6.05	142.05	1,151.45	6.59	243.93	383.65	2.07	25.55
Copper	mt	%	m lbs	mt	%	m lbs	mt	%	m lbs	mt	%	m lbs
Alumbrera	20.40	0.34	153.41	5.70	0.23	29.00	26.10	0.32	182.41	2.66	0.21	12.48
Caspiche	277.10	0.23	1,405.07	363.95	0.18	1,444.27	641.05	0.20	2,849.34	97.80	0.12	258.73
Cerro Casale	11.48	0.13	33.40	136.85	0.16	495.87	148.32	0.16	529.27	247.72	0.19	1,046.80
NuevaUnión	66.41	0.24	344.34	191.03	0.36	1,513.28	257.44	0.33	1,857.62	483.44	0.42	4,513.52
Totals	375.39	0.23	1,936.22	697.52	0.23	3,482.42	1,072.91	0.23	5,418.64	831.62	0.32	5,831.54
Lead	mt	%	m lbs	mt	%	m lbs	mt	%	m lbs	mt	%	m lbs
Peñasquito	89.88	0.29	579.65	95.86	0.29	609.99	185.74	0.29	1,189.63	14.87	0.17	54.13
Totals	89.88	0.29	579.65	95.86	0.29	609.99	185.74	0.29	1,189.63	14.87	0.17	54.13
Zinc	mt	%	m lbs	mt	%	m lbs	mt	%	m lbs	mt	%	m lbs
Peñasquito	89.88	0.59	1,161.20	95.86	0.49	1,044.22	185.74	0.54	2,205.42	14.87	0.63	206.63
Totals	89.88	0.59	1,161.20	95.86	0.49	1,044.22	185.74	0.54	2,205.42	14.87	0.63	206.63
Molybdenum	mt	%	m lbs	mt	%	m lbs	mt	%	m lbs	mt	%	m lbs
NuevaUnión	66.22	0.007	10.43	164.60	0.011	38.27	230.82	0.010	48.69	294.92	0.013	83.97
Totals	66.22	0.007	10.43	164.60	0.011	38.27	230.82	0.010	48.69	294.92	0.013	83.97

Notes:

- (1) All Mineral Reserves and Mineral Resources have been estimated in accordance with the CIM Definition Standards, and in the case of the Alumbra mine, the Ore Reserves have been estimated in accordance with the JORC Code. The JORC Code has been accepted for current disclosure rules in Canada under NI 43-101. Except for properties or projects listed in note 4 below, all Mineral Reserves, Ore Reserves and Mineral Resources set out in the tables above or elsewhere in this annual information form have been reviewed and approved by Patrick Garretson, SME Registered Member, Director, Resources and Reserves, Goldcorp, who is a qualified person as defined under NI 43-101.
- (2) All Mineral Resources are reported exclusive of those Mineral Resources that were converted to Mineral Reserves.
- (3) Mineral Resources which are not Mineral Reserves do not have demonstrated economic viability.
- (4) Mineral Reserves and Mineral Resources are reported effective December 31, 2018, with the following conditions or exceptions:
 - (i) Mineral Reserves and Mineral Resources for Pueblo Viejo are as per public information provided by Barrick in its 2018-year end report and fourth quarter results report dated February 12th, 2019 with an effective date of December 31, 2018 and were estimated under the supervision of Rick Sims, Vice President, Resources and Reserves, of Barrick, Geoffrey Locke, Manager, Metallurgy, of Barrick and Mike Tsafaras, P.Eng., Manager, Value Realisation, of Barrick. For additional information, see the technical report entitled "Technical Report on the Pueblo Viejo Project, Sanchez Ramirez province, Dominican Republic" dated March 19, 2018, prepared by Rosmary Cardenas, B.Sc., P.Eng., RPA Principal Geologist, Hugo Miranda, MBA, ChMC(RM), RPA Principal Mining Engineer and Holger Krutzmann, B.Sc., P.Eng., Associate Principal Metallurgist, with an effective date of December 31, 2017, which is available under our profile on SEDAR at www.sedar.com.
 - (ii) Mineral Reserves and Mineral Resources for the Cerro Casale Project are as per public information provided by Barrick in its 2017-year end report and fourth quarter results report dated February 15, 2018 but have been adjusted to reflect Goldcorp's 50% ownership in the Norte Abierto joint venture, have an effective date of December 31, 2017 and were estimated under the supervision of Rick Sims, Vice President, Resources and Reserves, of Barrick, Steven Haggarty, Senior Director, Metallurgy, of Barrick and Patrick Garretson, formerly Senior Director, Life of Mine Planning, of Barrick.
 - (iii) Mineral Resources for the Caspiche project are as per public information provided by Exeter Resource Corporation in its 2016 Annual Information Form dated March 24, 2017 but have been adjusted to reflect Goldcorp's 50% ownership in the Norte Abierto joint venture. The Mineral Resource Estimate for the Caspiche project with an effective date of April 11, 2012 was prepared by Mr. Ted Coupland, MAusIMM(CP), at the time, Director and Principal Geostatistician of Cube Consulting Pty Ltd.
 - (iv) Mineral Reserves and Mineral Resources for Alumbra are as per public information provided by Glencore plc in its 2018 year end Resources and Reserves Report with an effective date of December 31, 2018 and have been prepared under the supervision of Flavio Montini who is an employee of Glencore plc.
- (5) Mineral Reserves are estimated using appropriate recovery rates and US\$ commodity prices of \$1,200 per ounce of gold, \$18.00 per ounce of silver, \$2.75 per pound of copper, \$0.95 per pound of lead, and \$1.15 per pound of zinc, unless otherwise noted below:

(i) Pueblo Viejo	Gold - US\$1,200/oz; Silver – US\$16.50/oz
(ii) Cerro Casale	Gold - US\$1,200/oz; Silver – US\$16.50/oz; Copper – US\$2.75/lb
(iii) Alumbra	Gold - US\$1,250/oz; Copper - US\$2.91/lb
(iv) NuevaUnión	Gold – US\$1,250/oz; Copper - US\$3.00/lb; Molybdenum - US\$7.50/lb
- (6) Mineral Resources are estimated using US\$ commodity prices of \$1,400 per ounce of gold, \$20 per ounce of silver, \$3.00 per pound of copper, \$1.05 per pound of lead, and \$1.25 per pound of zinc, unless otherwise noted below:

(i) Pueblo Viejo	Gold - US\$1,500/oz; Silver - US\$20.50/oz
(ii) Cerro Casale	Gold - US\$1,500/oz; Silver - US\$20.50/oz; Copper - US\$3.50/lb
(iii) Caspiche	Gold - US\$1,250/oz; Silver - US\$15.00/oz; Copper - US\$2.75/lb
(iv) NuevaUnión	Gold - US\$1,250/oz; Copper - US\$3.00/lb; Molybdenum – US\$7.50/lb
(v) Alumbra	Gold - US\$1,250/oz; Copper - US\$2.95/lb

MINERAL PROPERTIES

Our material mineral properties are the Red Lake Mines and Éléonore Mine in Canada, the Peñasquito Mine in Mexico, the Pueblo Viejo Mine (40% interest) in the Dominican Republic, and the Cerro Negro Mine in Argentina.

Red Lake Mines, Canada

The Red Lake Mines, wholly-owned by Goldcorp, are located in the Red Lake district, Ontario. The scientific and technical information included in the following section has been derived, in part, from the technical report entitled “Red Lake Operations, Ontario Canada, NI 43-101 Technical Report” (the “**Red Lake Report**”) dated effective December 31, 2018 prepared by Brad Armstrong, P.Eng., Maura Kolb, P.Geo., and Nuri Hmidi, P.Eng., each of whom is a qualified person under NI 43-101.

Project Description, Location and Access

The Red Lake Mines are owned by Goldcorp Inc. (87.45%) and Goldcorp Canada Ltd. (“**Goldcorp Canada**”) (12.55%) through a partnership. The operations comprise the former Campbell and Red Lake underground mines, which are now integrated and operate as a single entity by Red Lake Mines. In this annual information form, the shafts and mill at Red Lake are collectively termed the Red Lake Complex; those at Campbell are termed the Campbell Complex. The combined mine area is also referred to as the greater Red Lake–Campbell Complex. The Cochenour Complex covers mineralization discovered at the Western Discovery Zone deposit and the former Cochenour–Willans mine and also includes the former Gold Eagle Mines joint venture property (see – “History” below).

The Red Lake mining operation is located 180 kilometres north of the town of Dryden, District of Kenora, northwestern Ontario. The Red Lake area is accessible by Highway 105, which joins the Trans-Canada Highway at Vermilion Bay, 175 kilometres south and 100 kilometres east of Kenora, Ontario. Commercial air services operate to Red Lake from Thunder Bay and Winnipeg.

The Red Lake Complex consists of 70 patented mining and surface rights claims, three patented mining rights only claims, 27 patented surface rights only claims, and six Licences of Occupation over water for a total of 106 claims covering 1,693 hectares. The Campbell Complex consists of 41 patented mining and surface rights claims and 15 Licences of Occupation for a total of 56 claims covering 786 hectares. Claims are held in the name of either Goldcorp, or Goldcorp Canada, or are jointly held by the two companies. The Cochenour Complex comprises a total of 111 claims over 1,367 hectares. This consists of 73 Patents with mining and surface rights, seven Patents with mining rights only, four Leases with mining rights only, 27 Licences of Occupation over water. Tenure is jointly held in the names of Goldcorp and Goldcorp Canada with the exception of the Gold Eagle Property claims (28 patented mining and surface rights claims and 16 Licences of Occupation) which are owned wholly by Goldcorp (100%). As required under Ontario law, patented mining lands have been surveyed. Required fees and duties have been paid to the appropriate regulatory authorities, and the claims are in good standing. Leases have associated work commitments and fees. A 21-year lease may be renewed provided that the lessee can prove that the mining lease is being used for mining purposes and meets certain criteria, and application for renewal is made prior to the expiry date of the lease. Lease expiry dates range from 2029 to 2039.

Red Lake Mines has collaboration agreements with two First Nations that are signatory to Treaty No. 3 and have treaty rights which they assert within the operations area of the Red Lake Mines region: Obishikokaang Collaboration Agreement executed August 16, 2013 with Lac Seul First Nation (“**LSFN**”) and Goldcorp Canada; and a second Collaboration Agreement which became effective on January 29, 2015 with Wabauskang First Nation (“**WFN**”) and Goldcorp Canada. LSFN is located to the southeast of Red Lake with a band membership of 3,200 and WFN is located to the south of Red Lake with a band membership of 315. These agreements provide a framework for strengthened collaboration in the development and operations of Red Lake Mines and outline tangible benefits for the individual First Nations, including skills training and employment, opportunities for business development and contracting, and a framework for issues resolution, regulatory permitting and Goldcorp’s future financial contributions.

We currently hold sufficient surface rights to support the Red Lake–Campbell mining operations and associated infrastructure, and sufficient surface rights in the Cochenour Complex to support any proposed re-development. Environmental permits are required by various federal, provincial, and municipal agencies and are in place for all current operations. No new permits are currently required for current exploration activity and mining operations, but existing permit amendments are required from time to time. The Cochenour Complex closure plan was filed in April 2014, and the closure plan for the Red Lake–Campbell Complex was filed in May 2015. These closure plans will be updated and merged into a single plan throughout 2019 and 2020. The Red Lake Mines and Cochenour Complex closure plans satisfy all regulatory requirements. We are satisfied that all material environmental liabilities are identified in the existing closure plans for the operations, which are limited to those that would reasonably be expected to be associated with gold mines that have been operating for more than 60 years, and where production is from underground sources, including roads, site infrastructure, and waste and tailings disposal facilities.

History

Red Lake Complex

The first recorded prospecting in the Red Lake district was carried out by the Northwestern Ontario Exploration Company in 1887. Red Lake was first staked during the Red Lake Gold Rush in 1926. In 1944, the property was re-staked and Dickenson Red Lake Mines Limited was incorporated. Production mining began in 1948 at a rate of 113 tonnes per day and increased to 454 tonnes per day in the 1970s. In the early 1980s, the mill capacity was increased to 907 tonnes per day and long-hole stoping was introduced. The change in mining method resulted in a severe drop in production grade. Cut-and-fill mining was subsequently reintroduced, and production reached approximately 907 tonnes per day by 1993 to 1994. An exploration core drilling program initiated in 1995 within the lower levels of the mine resulted in the discovery of a cluster of high-grade gold veins. The #3 shaft was developed from January 2004 to January 2007 to a depth of 1,925 metres.

Campbell Complex

The Campbell claims were staked in 1926. Subsequently, there was a period of claim cancellations and re-staking of the area. In the 1940s, George and Colin Campbell re-staked the area, Campbell Red Lake Mines was incorporated and Dome Mines Limited (“**Dome Mines**”) purchased an option that eventually resulted in Dome Mines acquiring a 57% ownership interest in the Campbell Red Lake Mines company. In 1946, after additional exploration had been carried out, a four-compartment shaft with four levels was sunk to a depth of 182 metres. Mill construction began in 1948 and the mill went into operation the following year reaching a capacity of 272 tonnes per day. The shaft was deepened to 655 metres in the 1950s to exploit a high-grade zone discovered on the 14th level of the mine. Following the merger of Campbell Red Lake Mines, Dome Mines and Placer Development Limited, in 1987, an autoclave was installed at the Campbell Complex, replacing the existing roaster, the mill flotation circuit was upgraded, a paste-fill plant constructed, an underground decline developed, and the Reid Shaft was commissioned.

Cochenour Complex

The original claims on the Cochenour–Willans property were staked in 1926 to 1927 by W.M Cochenour, D. Willans and H.G. Young, and in 1928 the Cochenour–Willans syndicate was formed. Cochenour–Willans Gold Mines Ltd. was incorporated in 1936 and production began in 1939 at a rate of 136 to 181 tonnes per day. Operations ran for 32 years, from 1939 to 1971, during which about 2.1 million tonnes grading 18.44 grams per tonne (“**g/t**”) of gold was processed with approximately 1.24 million ounces of gold recovered. Underground mine workings extended down to the 670metre level.

In 1997, purchase was completed for Goldcorp’s 100% interest in the Cochenour–Willans mine area. Following this, trenching, grab sampling and compilation work was completed between 1998 and 2002. The mine was allowed to flood in 2003. Surface drilling was undertaken from 2002 to 2009, consisting of 94 surface drill holes, totalling 66,968 metres. Following dewatering, in 2010, renewed access to the underground Cochenour–Willans workings allowed completion of 49 underground drill holes (20,558 metres), together with 17 surface drill holes (including wedges) totalling 13,881 metres.

The Cochenour No. 1 shaft was slashed and deepened to below the 34 level in 2010 to 2014 to support exploration and development of the recently acquired Gold Eagle property located to the south. Both decline and incline ramp developments are currently active from the 34 level station.

Historical Gold Production within the Red Lake Greenstone Belt to December 31, 2018

Mine	Years of Production	Ore Tonnes Milled	Ounces	Grams per Tonne
Red Lake Mines	2006–December 2018 ⁽¹⁾	8,977,311	6,443,300	22.32
Campbell Mine	1949–2006 ⁽²⁾	18,093,133	11,216,443	19.33
Goldcorp (Dickenson)	1948–2006 ⁽³⁾	8,715,238	5,962,948	21.29 ⁽⁴⁾
Madsen	1938–1976; 1977 ⁽⁵⁾ –1999	7,872,688	2,452,388	9.70 ⁽⁶⁾
Cochenour–Willans	1939–1971	2,096,656	1,244,279	18.44 ⁽⁷⁾
McKenzie Red Lake	1935–1966	2,135,364	651,156	9.50
Howey	1930–1941; 1957 ⁽⁸⁾	4,200,977	421,592	3.12 ⁽⁹⁾
Hasaga	1938–1952	1,374,642	218,213	4.94
Starratt Olsen	1948–1956	823,555	163,990	6.21
H.G. Young	1960–1963	261,432	55,244	6.58
McMarmac	1940–1948	138,779	45,246	10.15
Gold Eagle	1937–1941	163,380	40,204	7.64
Red Lake Gold Shore	1936–1938	78,320	21,100	8.36
Buffalo	1981–1982	29,017	1,656	1.78
Abino	1985–1986	2,479	1,397	17.52
Lake Rowan	1986–1988	11,814	1,298	3.43
Mount Jamie	1976	882	377	13.30
Red Summit	1935–1936	536	277	16.08
McFinley	1987		N/A	
Total		54,976,204	28,159,325	15.93

Notes:

- (1) Includes total production from the Red Lake complex from January 1, 2006, production from the Campbell complex Subsequent to May 12, 2006, the date of acquisition, and development starting in 2014 from Cochenour's Bruce Channel Deposit acquired from Gold Eagle Mines Ltd in 2008.
 - (2) Includes production under Placer Dome (CLA) Ltd. to May 12, 2006.
 - (3) For 1997, 1998, and 1999, no production due to strike by unionized employees.
 - (4) From 1970, includes production from Robin Red Lake.
 - (5) Includes clean-up of ore and materials from the mine site.
 - (6) Historical grade, actual grade for 1999 was 0.14 ounces per ton gold.
 - (7) Includes production from Annco and Wilmar properties.
 - (8) Continuous production from 1930 to 1941; includes 268 ounces recovered from clean up in 1957.
 - (9) The ore mined at Howey, before sorting, totalled 5,158,376 tons. The average production from run-of-mine ore was therefore 0.0817 ounces per ton gold.
- N/A = not available.
Table data modified from Lichtblau et al., (2014)

Geological Setting, Mineralization and Deposit Types

Red Lake Mines is a world class mesothermal greenstone-hosted gold deposit.

Red Lake Mines is hosted in the Red Lake greenstone belt within the Uchi Domain on the southern margin of the North Caribou Terrane of the Superior Province, Canada. The Red Lake belt comprises approximately 300 million years of geologic activity with multiple episodes of volcanism, sedimentation, plutonism and deformation that range from Meso- to Neoarchean in age with gold mineralization having occurred between 2723 and 2712 Ma.

The belt is host to a variety of gold deposits including the Red Lake Mines, the Cochenour Mine and the past-producing Madsen Mine all of which are hosted in mafic to ultramafic volcanic rocks, the McKenzie,

Gold Eagle, Howey/Hasaga and Buffalo mines hosted in granitic plutons and the stratabound Bonanza deposit.

Red Lake Mines is underlain mainly by tholeiitic basalt and locally by komatiitic basalt of the Balmer Assemblage. The mine sequence also includes felsic, peridotitic and other mafic to lamprophyric intrusive rocks of various younger ages. Both Red Lake- Campbell and Cochenour deposits are hosted within significantly folded and sheared portions of the Balmer assemblage. Shear zones act as primary hydrothermal fluid corridors and host significant portions of the gold mineralization in the area. Other significant mineralized structures occur within lower-strain areas of the stratigraphy, usually associated with brittle conjugate fracture systems in close proximity to lithological boundaries possessing high competency contrasts.

Gold mineralization is hosted in a variety of rock types within the Red Lake Greenstone belt, although the majority of the productive zones occur as vein systems accompanying sulphide replacement within sheared mafic to komatiitic basalts of the Balmer Assemblage.

Gold bearing zones in the Red Lake-Campbell and Cochenour deposits are distinguished first by spatial orientation relative to structural corridors and second by the style of mineralization. It is common for zones to have multiple styles of mineralization within the same host lithology. There are four styles of mineralization common in the Red Lake-Campbell and Cochenour deposit:

- Vein style gold mineralization
- Vein and sulphide style
- Disseminated sulphide (replacement Style) mineralization
- Free gold mineralization

The Western Discovery zone mineralization consists of a series of sub-parallel, quartz-rich extensional veins within the McKenzie granodiorite stock.

Gold appears as free milling gold as well as refractory, arsenopyrite-associated gold.

Our knowledge of the deposit setting and lithologies, and of the mineralization style and its structural and alteration controls, is sufficient to support Mineral Resource and Mineral Reserve estimation.

Exploration

The Red Lake operations have a long exploration and mining history. Gold mineralization was first identified in 1922. The original Red Lake mine commenced production in 1948, and the Campbell mine in 1949.

Exploration activities at Red Lake have included regional and detailed geological and structural mapping, rock, silt and soil sampling, trenching, reverse circulation and diamond drilling, airborne geophysical surveys, ground induced polarization geophysical surveys, mineralization characterization and petrographic studies, metallurgical testing of samples, Mineral Resource and Mineral Reserve estimates, baseline environmental, geotechnical and hydrological studies, and technical studies.

In 2018, exploration drilling programs totalling 97,378 metres with 426 core holes were carried out at the Red Lake and Campbell Complexes; and an additional 51,136 metres with 248 core holes at the Cochenour deposit.

The exploration programs completed to date are appropriate to the known mineralization styles. There is considerable remaining exploration potential in the vicinity of the current mining operations and the Red Lake region.

Drilling

A significant amount of surface and underground core drill data has been collected over the 60+ year history of Red Lake. Drilling from 1947 to 2018 at the Red Lake and Campbell Complexes totals 67,437 drill holes (approximately 6,381,731 metres). Drilling at the Cochenour Complex from 1939 to 2018 comprises about 13,840 drill holes (approximately 1,396,170 metres).

Drill spacing in the Red Lake–Campbell and Cochenour deposits are variable. Typically, drilling to outline Mineral Resources is at a spacing of 30 to 60 metres, infill drilling is carried out at 15 to 25 metre centres, and definition drilling is completed on 3 to 7.5 metre centres. For exploration targets, potential drill spacing is approximately 45 to 100 metres.

Standardized logging forms and geological legends are currently used. Logs record assays, lithologies, veining and replacement zones, vein styles and percentage amounts over sampled interval lengths and intensity, sulphide mineralization type and intensity, alteration type and intensity, faults and fracture frequency and orientation, rock quality designation, and structure type, frequency and intensity. Select drill holes are photographed.

Core quality is very high, with core recovery on average >95% on all core sizes. There are no areas where poor recovery is consistently encountered.

The collars of all drill holes are surveyed by transit for location, bearing and dip and tied into the mine grid. The same grid is used for all of the mine complexes.

Downhole surveys, since the start of 2018, have typically been conducted with a solid-state north-seeking gyro. This technology continues to see improvements, with repeatability, durability and accuracy of both azimuth and dip greatly increased from prior iterations. Holes between 30° and -30° dip currently require user input for the correct azimuth, which is obtained by using Leica TS15 total station and established mine grid survey control. Active drilling quality control is completed using the Reflex EZ-Shot electronic compass single shot tool.

Downhole surveys prior to the start of 2018 at Red Lake Complex were conducted with a gyroscopic (gyro) survey instrument (unaffected by magnetism) used for drill holes steeper than 70°, and a Reflex Maxibor (Maxibor) survey instrument used for drill holes with flatter dips. Site specifications require downhole surveys at 30 metre intervals or less. In the earlier stages of the mining operation, Sperry Sun multi-shot, Icefield multi-shot, Light-Log and Tropari instruments were used.

Downhole surveys at the Campbell Complex utilized Reflex and Ranger electronic compass single-shot surveys tests. Most of the drill holes greater than 120 metres were surveyed using the Maxibor method. Prior to that, Pajari test instruments were used, which provided azimuth and dip orientations. Sperry Sun multi-shot instruments were used on deep (>300 metres holes) for a period from the early 1980s to the late 1990s. Pre-1980 and into the 1990s, drill hole inclination was derived using “acid tests”.

Due to the age of the operation, and the time span of drilling on the project, there are a few drill holes where there is uncertainty about the intercept location; however, statistical tests of the drill results performed to date indicate that location errors in drill holes that support estimation of Mineral Resources or Mineral Reserves are not material. Mining to-date has not encountered any problems with mis-located drill intercepts and ore outlines conform well to the outlines. We continue to re-survey holes that appear to have location or downhole problems; however, the deviation in the drill holes is generally small and predictable.

Drill data are typically verified prior to Mineral Resource and Mineral Reserve estimation by running a software program check.

Core sampling practices have varied between predecessor companies and over time. Typically, historic core sampling has targeted mineralized zones with additional bracket samples taken in waste rock. Current practice has changed, with some exceptions, to sampling the entire drill hole. Presently a high

percentage of core sent out for assaying is whole core. A select amount of core is cut and retained. This core in recent years has been from select, deep, High Grade Zone drilling and surface drilling.

At Red Lake Complex, sampling honored lithological and mineralized zone boundaries. Typical sample lengths were 90 centimetres for un-mineralized intervals, 60 centimetres or less for mineralized intervals, and 30 centimetres intervals for visible gold, though samples were taken on shorter intervals that directly corresponded to very narrow, high-grade mineralized structures.

Until 1999 at the Campbell Complex, sample lengths were typically in the 0.6 to 1.0 metres range, and usually shorter in the higher-grade sections. Low-grade rock and waste were typically sampled over 0.6 to 1.5 metres lengths, averaging 0.67 metres. High-grade sections were sampled over 15 centimetres to 60 centimetres intervals for BQ and NQ core, and 0.90 metres for smaller AQ/AQTK core, except where significant geological differences were present, these normally being narrow, high-grade occurrences.

For production purposes, chip sampling is performed on a blast-by-blast basis by the production geology team, while muck sampling is done by the miner during the mucking process. Muck samples are used to provide a general guide and back-up information for day to day operation, while test holes are required to ascertain that no mineralization is missed in the walls of the stope.

Historically a specific gravity of 2.91 (11.0 cubic feet per short ton) has been used at the Red Lake Complex. A specific gravity of 2.98, developed from composite averages, is used for the High Grade Zone. During completion of the resource estimation on the Cochenour Complex, a specific gravity of 2.91 was used for all zones except the Western Discovery Zone. Since 2017 specific gravity measurements have been collected on drill core to confirm or update these specific gravity assumptions.

The quantity and quality of the lithological, geotechnical, collar, and down-hole survey data collected during the exploration and infill drill programs are sufficient to support Mineral Resource and Mineral Reserve estimation.

Sampling, Analysis and Data Verification

Given the long production history, a number of laboratories have been used in support of operations.

Drill core and underground samples were analysed by a combination of independent laboratories and the Red Lake and Campbell Complex run-of-mine laboratories, using industry-standard methods for gold analysis. In general, exploration and infill core programs were analysed by independent laboratories using industry-standard methods for gold analysis from 2001. Current run-of-mine sampling is performed by the mine laboratory, which is operated independently of Goldcorp. Historically, the Campbell and Red Lake run-of-mine laboratories primarily performed day to day assays for mining operational purposes; however, exploration core has also been processed through the laboratories. Neither laboratory has held International Organization for Standardization ("ISO") accreditation. All remaining laboratories used for analytical data have held ISO certifications since 2001; it is not known what certification was held prior to that date.

Sample preparation for exploration and run-of-mine samples consists of drying as required, crushing, and selection of a sub-split that is then pulverized to produce a pulp sample sufficient for analytical purposes. The sample preparation procedure is in line with industry-standard methods for gold deposits that have coarse visible gold and a high nugget effect.

Samples are typically analyzed using fire assay with a gravimetric or atomic absorption finish, depending on the anticipated grade of the sample. In 2010, selected exploration drill core samples were submitted for inductively-coupled plasma analysis as well as the regular fire assay/atomic absorption/gravimetric analysis. A certain percentage of the samples were also selected for pulp metallic analysis.

The collected sample data adequately reflect deposit dimensions, true widths of mineralization, and the style of the deposits.

There is limited information available on the quality assurance and quality control (“QA/QC”) employed for the earlier drill programs; however, sufficient programs of reanalysis have been performed that the data can be accepted for use in estimation. Our drill programs since 2006 on the Red Lake and Campbell Complexes have included insertion of blank and certified standard reference material (SRM) samples. Submission of QA/QC samples was initiated for the Cochenour Complex in 2010 and comprises submission of SRM and blank materials. In 2017, QA/QC standard and blank insertion rates were increased, and field duplicates were also introduced.

Collected data was subject to validation, using in-built program triggers that automatically checked data on upload to the database. Data are also verified against the original hard copy monthly reports, as well as in other software packages. Verification is performed on all digitally-collected data on upload to the main database, and includes checks on surveys, collar co-ordinates, lithology data, and assay data. The checks are appropriate, and consistent with industry standards.

Drill core sample security is maintained at the Red Lake–Campbell Complex and the Cochenour Complex through supervision of transport of the core from the underground/surface drill or sample site, through to the logging facility and to the in-house or external assay laboratories. Chain-of-custody procedures consisted of filling out sample submittal forms that were sent to the laboratory with sample shipments to make certain that all samples were received by the laboratory. Current sample storage procedures and storage areas are consistent with industry standards.

The quality of the gold analytical data is sufficiently reliable to support Mineral Resource and Mineral Reserve estimation and that sample preparation, analysis, and security are generally performed in accordance with exploration best practices and industry standards.

Several data verification programs and audits have been performed at Red Lake Mines over recent history by independent consultants in support of technical reports and by our personnel in support of mining studies. Internal validations were also completed and data verification checks were performed as follows:

- Micon International Limited (2004, 2006): Micon staff reviewed available data in support of technical reports prepared in 2004 and 2006 for Exall/Southern Ventures; no material biases or errors noted;
- Watts, Griffis, and McOuat (2005, 2007): reviewed the QA/QC program and the logging and sampling/assaying procedures; concluded at the time of each audit that the database was in good order and that the procedures were to industry standards; and
- Goldcorp (2006 to date): database validation checks, laboratory inspections; no material biases or errors noted.

A reasonable level of verification has been completed, and no material issues have been left unidentified from the programs undertaken. Data verification programs completed on the data collected adequately support the geological interpretations, and the quality of the analyses and the analytical database, and therefore support the use of the data in Mineral Resource and Mineral Reserve estimation.

Mineral Processing and Metallurgical Testing

Over the project history, a significant number of metallurgical studies and accompanying laboratory-scale and/or pilot plant test work have been completed. Studies included mineralogical studies, grindability and comminution test work, bench and pilot plant flotation tests, thickener tests and reagent test work.

Programs were sufficient to establish the optimal processing routes for the Red Lake–Campbell ores, were performed on mineralization that was typical of the deposits, and supported estimation of recovery factors for the various ore types.

Test work to date on the Cochenour Complex mineralization indicates that mineralization types at Cochenour can be treated in the current Campbell process plant. The Bond work index determinations showed that the Bruce Channel mineralization hardness can be described as moderate to moderately soft. Therefore, the mineralized material should be readily processed in the existing grinding circuit at the Campbell Complex. Relatively poor leach-only recoveries indicated that a refractory ore treatment process (autoclave) is required to achieve reasonable overall gold recovery

There have been no significant levels of deleterious elements identified to date, and it is unlikely that deleterious elements will be an issue for future operations at Red Lake.

Mineral Reserve and Mineral Resource Estimates

The following table sets forth the gold Mineral Reserve estimation for Red Lake Mines effective December 31, 2018:

Proven and Probable Mineral Reserves ⁽¹⁾⁽²⁾⁽³⁾⁽⁴⁾⁽⁵⁾⁽⁶⁾

Category	Tonnes (millions)	Grade	Contained Metal
		Gold (grams per tonne)	Gold (millions of ounces)
Proven	1.53	10.24	0.50
Probable	7.66	6.30	1.55
Proven + Probable	9.19	6.95	2.05

Notes:

- (1) Mineral Reserves for the Red Lake Mines set out in the table above have been reviewed and approved by Brad Armstrong, P.Eng., an employee of Goldcorp, and a qualified person under NI 43-101. The Mineral Reserves are classified as Proven and Probable Mineral Reserves and are based on the CIM Definition Standards.
- (2) Mineral Reserves are estimated using a gold price of \$1,200 per ounce and a US\$ exchange rate of C\$1.30. These assume processing costs of \$33.75 per tonne, mining operating costs of \$177.61 per tonne and general and administrative ("G&A") costs of \$60.08 per tonne, for a total life-of-mine estimated operating cost of \$271.44 per tonne.
- (3) The estimated metallurgical recovery rate is 94% for the Red Lake-Campbell Complex and 92.9% for the Cochenour Complex.
- (4) All decisions for inclusion or exclusion of material as Mineral Reserves are based on a detailed assessment of costs versus revenues. A global cut-off grade was calculated to be 7.5 g/t. Individual cut-off grades were used for design purposes and are dependent on mining method and area. The following cut-off grades were used: long-hole low cost: 5.1 g/t gold; and long-hole higher cost: 6.5 g/t gold.
- (5) Mineral Reserves are constrained within mineable shapes, with varying mining widths that vary from 2.4 to 10.7 metres, depending on the geometry of the ore body and mining method used. The operations use 100% mine recovery for scheduling the life-of-mine plan Mineral Reserves for the operation as a whole.
- (6) Numbers may not add up due to rounding.

The following table sets forth the gold Mineral Resource estimation for Red Lake Mines effective December 31, 2018:

Measured and Indicated Mineral Resources ⁽¹⁾⁽²⁾⁽³⁾⁽⁴⁾⁽⁵⁾⁽⁶⁾
(excluding Proven and Probable Mineral Reserves)

Category	Tonnes (millions)	Grade	Contained Metal
		Gold (grams per tonne)	Gold (millions of ounces)
Measured	1.52	18.15	0.89
Indicated	3.78	13.50	1.64
Measured +Indicated	5.30	14.83	2.53
Inferred	4.93	15.10	2.39

Notes:

- (1) The Mineral Resources for Red Lake Mines set out in the table above have been reviewed and approved by Maura Kolb, P.Geo., an employee of Goldcorp, and a qualified person under NI 43-101. The Mineral Resources are classified as Measured, Indicated and Inferred Mineral Resources, and are based on the CIM Definition Standards.
- (2) All Mineral Resources are reported exclusive of those Mineral Resources that were converted to Mineral Reserves. Mineral Resources are not known with the same degree of certainty as Mineral Reserves and do not have demonstrated economic viability.
- (3) Based on a gold price of \$1,400 per ounce and a US\$ exchange rate of C\$1.30.
- (4) Mineral Resources are reported using variable cut-off grades depending on the mineralization type and zone. Mineral Resources are reported at a cut-off grade of 6.89 g/t for Red Lake-Campbell Complex and 5.55 g/t for Cochenour Complex. The in-situ block model has been diluted to minimum horizontal widths of 1.2 metres in the HGZ and 2.40 metres in all other zones. Dilution is assigned zero grade.
- (5) Mineral Resources for Red Lake-Campbell Complex are estimated using 94% metallurgical recovery, and 92.9% metallurgical recovery for Cochenour Complex.
- (6) Numbers may not add up due to rounding.

Environmental, metallurgical, permitting, legal, title, taxation, socio-economic, marketing, political and other relevant factors and constraints have been taken into account. The Mineral Reserves are acceptable to support mine planning. Areas of uncertainty that may materially impact the Mineral Resource and Mineral Reserve estimates include: commodity price and exchange rate assumptions used; rock mechanics (geotechnical) constraints; geological complexity; and maintaining constant underground access to all working areas.

Mining Operations

Red Lake Mines consists of a single underground operating mine (Red Lake and Campbell Complexes). The Cochenour Complex is in the execution phase, establishing material handling, pastefill and other infrastructure towards the planned start to commercial production in 2019. Mining consists of: sub-level longhole stoping, mechanized underhand or overhand cut and fill techniques and development mining methods. Mined areas are routinely paste filled to maintain overall stability. Production forecasts are expected to be achievable with the current equipment and plant, and replacements have been acceptably scheduled.

As part of day-to-day operations, continued reviews will occur on the mine plan and consideration of alternatives to and variations within the mine plan. Alternative scenarios and reviews can be based on ongoing or future mining considerations, evaluation of different potential input factors, assumptions and corporate directives.

Processing and Recovery Operations

Campbell Complex

At the Campbell Complex, conventional crushing and grinding is followed by gravity concentration to recover free-milling gold. Refractory gold, finely disseminated in the arsenopyrite and pyrite matrix, is recovered by flotation followed by pressure oxidation, neutralization and carbon-in-leach. This stream joins the non-refractory flotation tails and is recovered by cyanidation/carbon-in-pulp ("CIP") processing. The permitted capacity is 1,800 tonnes per day. The plant effective capacity is 1,620 tonnes per day and depending on metallurgical type, average life-of-mine gold recoveries can range from 94.0% to 96.4%.

Tailing can either be discharged to the tailing management area or sent underground by piston pump for use as backfill as a paste. Cement and flyash is added to the paste and the paste fill is used to stabilize mined out openings in the Campbell Complex.

Red Lake Complex

Process facilities at the Red Lake Complex consist of three separate plants: the crushing plant; processing plant; and paste fill plant. Commercial production from the facilities began on January 1, 2001. The permitted plant capacity is 1,250 tonnes per day. The plant effective capacity is 980 tonnes per day and depending on metallurgical type, average life-of-mine gold recoveries can range from 95.8% to 97.4%.

The crushing plant is a two-stage process which reduces underground ore from about 30 centimetres to 1 centimetre. Underground ore from a coarse ore bin is fed to a jaw crusher and sizing screen. Screen oversize is crushed in a cone crusher and screen undersize is conveyed into a fine ore bin as plant feed material.

Unit operations in the processing plant include grinding, gravity concentrating, cyanidation, CIP, carbon elution and reactivation, electrowinning, bullion smelting/refining, cyanide destruction, flotation, and concentrate handling. Coarse gold is recovered from the ore via the gravity concentrating circuit. A portion of the ground slurry from the ball mill is fed to two Knelson concentrators which produce a gravity concentrate that is upgraded on a Diester table to a concentration of approximately 75% gold, and directly smelted into bullion. Bullion is then shipped to a refinery for later sale into the spot market. The Red Lake Complex processing plant also employs a typical sulphide flotation circuit generating a bulk sulphide concentrate. This concentrate is pumped as slurry to the Campbell Complex for processing in the autoclave.

Infrastructure, Permitting and Compliance Activities

Mining activities are conducted in and about the Municipality of Red Lake and are located near established power and road infrastructure. Local businesses offer most goods and services required for mineral exploration and development. Additional supplies can be sourced as needed from Thunder Bay or from larger Provincial centres such as Winnipeg and Toronto. Together with multiple shaft accesses to the underground workings, Goldcorp maintains administrative, technical, operations support, and processing facilities on the active sites. There are modern camp facilities to maintain the required permanent workforce for operations and construction.

Potable water is supplied by the municipality and paid for on a usage basis. Process water for the mills is predominantly reclaimed from the tailings areas or the underground mine. Additional process water is taken from Balmer Lake as required. Process water for underground operations is taken from Sandy Bay-Red Lake. Power is supplied through Hydro One via the E2R radial line. Diesel-powered generators provide temporary emergency power in the event of a main electrical disruption to allow the mine site to maintain basic services. Waste rock is stored in designated areas at both the Red Lake and Campbell Complexes. The waste pads are located in a historic tailings area east of the site at the Red Lake Complex and on the northeast side of the main tailings pond at the Campbell Complex. The tailings storage facilities at the Campbell and Red Lake Complexes are currently permitted for dam raises that are expected to provide storage to 2020 and 2022, respectively. Additional design and permitting is in progress and will increase the storage capacity within the existing facilities beyond these dates.

Environmental permits are required by various Federal, Provincial, and municipal agencies, and are in place for project operations. Red Lake Mines maintains a list of active environmental permits covering operation of the Campbell and Red Lake Complexes and Balmer Assemblage. Appropriate permits are held under local, provincial, and Federal laws to allow current exploration activity and mining operations. No new permits are currently required, but existing permit amendments are required from time to time, and in 2019, applications for amendments may be made for tailings management area upgrades (i.e. dam raises), air/noise permits, permit to take water renewals, and exploration permitting. Permit amendments are routinely applied for and obtained to accurately reflect ongoing operational needs of the mining facilities.

The environmental management system and environmental and social management plans were developed in accordance with the appropriate Canadian regulations.

Arsenic remains a focus in most environmental programs for all project operations. Arsenopyrite is a main element in the local geology, contained in ore and waste rock and requires specific management in environmental programs.

Waste rock and ore are routinely sampled for acid rock drainage potential as per the internal programs for acid rock drainage and metal leaching. Since there are no significant acid rock drainage issues related to the waste and ore from the Campbell and Red Lake Complexes and Balmer Assemblage, waste rock materials can be used for onsite construction purposes.

Active tailings facilities for the operations were designed by third-party consultants. Annual geotechnical and facility inspections are conducted by these firms. In addition, engineering assessments and investigations to enhance tails storage strategies are performed as required.

Water treatment processes are in place at both milling/tailings facilities to address the destruction of cyanide and metals in solution. Both the Campbell and Red Lake operations utilize passive wetland treatment technologies to assist with the reduction of ammonia from mining and milling processes. All effluent discharges to the environment comply with applicable laws.

The development of site-specific water quality objectives for surface water and groundwater, in addition to the long-term stabilization of underground arsenic storage facilities continue to be the focus of ongoing research and closure planning.

The mining complexes are situated on the edges of the Red Lake district communities which make them a part of the community landscapes. Given these proximities, operational and environmental considerations are paramount, as are our commitments to social, cultural, and community support. Currently Red Lake Mines has representation on various local organizations such as the local municipal planning boards, economic development board and maintains an open dialogue with the community.

Capital and Operating Costs

Capital cost estimates are based on experience gained from current operations, 2018 budget data, and quotes received from manufacturers during 2018. Capital cost estimates include funding for infrastructure, mobile equipment replacement, development, drilling, and permitting as well as miscellaneous expenditures required to maintain production. Infrastructure requirements are incorporated in the estimates as appropriate. Mobile equipment is scheduled for replacement when operating hours reach threshold limits. Sustaining capital costs reflect current price trends. The remaining life-of-mine capital expenditure is estimated at \$222.9 million.

Area	Life-of-Mine (\$ million)
Sustaining	\$222.9
Expansionary	-
Total	\$222.9

Operating cost estimates are based on actual historical data and include adjustments to reflect market conditions. The estimated average annual operating cost is \$271.44 per tonne, consisting of \$33.75 per tonne for processing, \$177.61 per tonne for mining, and \$60.08 per tonne for G&A.

Area	Life-of-Mine (\$ per tonne)
Process Plant	\$33.75
Mining Operations	\$177.61
G&A	\$60.08
Total	\$271.44

Exploration, Development and Production

Red Lake and Campbell Complexes

Mine exploration drilling in 2018 focused on the Aviation Complex (Snowbird Zone), Deep Sulphides/ESC, High-Grade Zone Footwalls, Hanging-Wall Seven (HW7), PLM's and High-Grade Zone offset. Exploration was carried out on 30, 31, 32, 44, 46, 49 and 51 level. Exploration development was completed on 51L during 2018 for HW7 and on 31L for PLM's and Snowbird.

In 2019, the mine exploration focus will be on expansion of the Aviation Complex and the continued geological and economic evaluations of historic zones in the Red Lake-Campbell Complexes.

Cochenour Complex

During 2018, the focus of exploration drilling was on expanding and delineating the known zones within the Cochenour Complex. All drill core produced from the drilling campaigns was orientated to allow for a better understanding of the structural complexities within the zones at Cochenour.

The areas targeted were on the upper main zone and banded iron formation resources between the 4400 and 3735 levels. A smaller portion of drilling was focused on exploring the Cochenour fault target which is situated to the east of the upper main zone. Drilling from the 3735, 3990, 4400 levels utilised up to four drills totalling 321 drill holes and 44,598 metres.

Pre-production at Cochenour for the 2018 year was focused on the Upper Main Zone area. This area produced 97,563t at 5.14g/t for 15,103 ounces poured, with an average mill recovery of 93.76% during the year. Production moving forward in 2019 and beyond will consist of sill development and long hole stoping using a bottom up approach. Continued advancement of both the incline and decline will see the connection of the Lower Cochenour and Upper Cochenour mining horizons completed in 2021. Exploration development will also continue with new platforms being excavated to enable better exploration and delineation of the Upper Main Zone and Banded Iron Formation areas.

In 2019, the exploration focus at Cochenour will be on the continued expansion and delineation of the Upper Main Zone and the Banded Iron Formation area. There are also plans to explore new targets which are near to the current mining infrastructure.

H.G. Young

In 2018, a total of 52,945 metres were drilled from both surface and underground with 139 oriented holes: 21,765 metres from surface and 151,940 metres from underground. Underground holes were drilled from 14L Campbell to gain additional information on the plunge orientation and controlling geological structures constraining the H.G. Young deposit.

At the Red Lake Mines, our gold production for 2019 is expected to be in the range of 195,000 to 225,000 ounces. See "Risk Factors – Our financial projections rely on estimates of future production and estimates of future production may vary, which could have a negative impact on our future cash flows, business, results of operations and financial condition".

Éléonore Mine, Canada

The Éléonore Mine, wholly-owned by Goldcorp and located in northern Québec, is one of the largest underground mines in Canada. The scientific and technical information included in the following section has been derived, in part, from the technical report entitled Éléonore Operations, Quebec, Canada, NI 43-101 Technical Report (the “**Éléonore Report**”) dated effective November 30, 2018 prepared by Dr. Anne Charland, P.Geo., Mr. Martin Perron, P.Eng., Ms. Adrienne Rispoli, P.Eng., Mr. Martin Bussi res, P.Eng., and Ms. Sophie Bergeron, P.Eng., each of whom is a qualified person under NI 43-101.

Project Description, Location and Access

The Éléonore Mine is located in the Lake Ell area, in the north-eastern part of the Opinaca Reservoir of the James Bay region, in the Province of Québec, Canada. The Éléonore Mine is located approximately 350 kilometres north of the towns of Matagami and Chibougamau, and 825 kilometres north of Montréal.

The closest towns to the operations are Matagami and Chibougamau. The Éléonore Mine is accessed via a road that extends from the Sarcelle hydroelectric facility to the Éléonore site. The Sarcelle hydroelectric station can be reached via a 40 kilometres long gravel road starting at the 396 kilometre marker along the James Bay Highway (Route de la Baie-James). All of the material, supplies, and food for the construction and operational phases are transported along this access route. Workers are brought on site via a permanent year-round air strip located approximately 1.5 kilometres north of the camp.

The Éléonore Mine comprises 369 contiguous claims totalling 18,971.7 hectares in addition to a granted mining lease (289.4 hectares), for a total tenure holding of 19,261.1 hectares. The claims are 100% owned by Les Mines Opinaca Lt e (“**Opinaca**”), our indirect wholly-owned Subsidiary. The Éléonore Mine hosts the Roberto gold deposit, which consists of the Roberto, East Roberto, and Zone du Lac lenses. The Roberto deposit is located under the Opinaca Reservoir. Mining Lease #1009, covering the Roberto deposit, was granted by the Québec government in February 2014. The lease is valid for a 20-year period with annual fees payable. Under Québec law, claims in the James Bay area are map-staked.

The Éléonore Mine is located entirely in Cree territory, or Eeyou Istchee, on Category III lands belonging to the Québec government and subject to the James Bay and Northern Québec Agreement. Surface leases were obtained from the Ministry of Natural Resources for all infrastructures planned for the Éléonore Mine.

A net smelter return royalty is payable on production from the Éléonore Mine to Osisko Gold Royalties Ltd. The royalty is calculated as a percentage based on a combination of actual mine production and the prevailing gold price, and starts at 2% on the first three million ounces of gold, and increases by 0.25% per million ounces thereafter, up to a maximum of 3.5%. The royalty is applicable to the entire Éléonore Mine property. The royalty payable in each period is adjusted up or down by an amount ranging between zero and 10%, depending on the gold price in effect during that period.

We also make an annual payment to the Cree Nation under the terms of the confidential Opinagow Collaboration Agreement dated February 21, 2011 between Goldcorp, the Grand Council of the Crees (Eeyou Istchee), the Cree Regional Authority and the Cree Nation of Wemindji.

The Éléonore Mine currently holds all required permits to operate, including environmental permits.

To the extent known, there are no other material factors and risks known to Goldcorp that may affect access, title, or the right or ability to perform work on the Éléonore Mine.

History

The first recorded exploration in the Éléonore Mine area was by Noranda Inc. (“**Noranda**”), in 1964. Noranda identified a copper showing located within the Ell Lake diorite intrusion. From 2001 to 2004, Osisko Mining Corporation (formerly Virginia Mines Inc.) (“**Osisko**”) completed regional reconnaissance grab and channel sampling around Noranda’s Ell Lake copper showing; this work identified a number of new showings. A series of mineralized corridors consisting of stockworked gold and chalcopyrite-bearing

quartz veinlets were outlined within dioritic to tonalitic intrusions. In addition, a number of mineralized and partially-rounded erratic blocks, located about 300 metres from the mineralized corridors, returned significantly elevated copper, gold, and silver values.

The Roberto deposit was located toward the end of 2003. Work completed subsequent to the discovery included a helicopter-borne, detailed magnetic survey (45-line kilometres on two 50 metres line spaced grids), additional trenching, core drilling of 351 core holes (105,635 metres), 125.5 kilometres of grid lines, 226.3 line kilometres of IP geophysical survey, and B-horizon soil sampling (1,244 samples). From June to August 2004, additional trenching was performed on the Roberto Zone. Osisko commenced core drilling in September 2005 and by November 2005 a total of 247 core holes had been drilled. Drilling completed by Osisko successfully extended the mineralization found at surface to a depth of 800 metres below surface. It also extended the mineralization beyond the Roberto Peninsula into the James Bay area and on the north shore of Ell Lake as well as to the south.

We reached an agreement to acquire the Éléonore Mine with Osisko in November 2005. We took control of the Éléonore Mine on March 31, 2006. Since the acquisition, we have performed till sampling, lake-bottom sediment sampling, surface mapping and trenching, additional core drilling, Mineral Resource and Mineral Reserve estimation, engineering studies, and mine permitting activities. Mine construction commenced in November 2011, and the first gold pour occurred on October 1, 2014.

Geological Setting, Mineralization and Deposit Types

The Roberto deposit is located in Archaean rocks of the Superior Province of Canada in the transition zone between the Opinaca Subprovince and the La Grande Subprovince. The contact between the two subprovinces is not well known and generally corresponds to regional-scale deformation zones and a sharp change in the metamorphic gradient. In some areas, the contact is masked by late intrusions of one or the other subprovince.

The Opinaca Subprovince basin is a sedimentary basin dominated by migmatized paragneisses and diatexites from the Laguiche Complex and intruded by syn to post-tectonic tonalite, granodiorite, granite and pegmatite intrusions from the Janin and Boyd intrusive suites. The metamorphic grade increases from amphibolites facies near the margins to granulite facies toward the center of the basin. The paragneisses are strongly metamorphosed and folded rocks that retained few of their original structures.

The “S-shaped” La Grande Subprovince surrounds the Opinaca Subprovince on its west and north sides, spanning a distance of 450 kilometres in the east-west direction and of 250 kilometres in the north-south direction. The La Grande Subprovince is an assemblage of volcano-plutonic rocks composed of 85% intrusive rocks and 15% volcano-sedimentary units, the latest forming the volcano-sedimentary units of the La Grande River and Eastmain River green belts. These assemblages overlay an older tonalitic basement. Metamorphic grade increases from the greenschist facies to the amphibolites facies toward the contact with the Opinaca Subprovince. The Éléonore Mine is overlain by rocks of the Eastmain Group of the La Grande Subprovince. At its base, the Eastmain Group consists of the Bernou Formation and the Kasak Formation, which are composed of basalts and intermediate to felsic tuff.

Regional faults are mainly present in the La Grande Subprovince and are oriented north-south, east-west, and northwest-southeast. In outcrop, the faults can be recognized by either a strong tectonic banding or by the presence of intense shear zones with mylonitization. In the Opinaca Subprovince, faults and shear zones are mainly located along fold limbs.

The Éléonore Mine straddles the contact between the Opinaca and La Grande Subprovinces. The contact is located in the northeast corner of the property along a north-westerly trend that is defined by a strong shear zone, a change in the magnetic grain, and an increase in the metamorphic gradient. The Éléonore Mine is hosted in Archaean-age rocks of a volcano-sedimentary greenstone belt developed near the contact between the Opinaca and La Grande Subprovinces of the Superior Province. Rock units from the Opinaca Subprovince occur in the north-eastern corner of the Éléonore Mine area. Lithologies are dominated by granite, granodiorites and heterogeneous assemblages of pegmatites, tonalites and granites from the Janin Intrusive Suite intermixed with partially migmatized paragneiss from the Laguiche

Complex. The structural grain is oriented in a north-westerly direction evolving to an east-west grain toward the east part of the Éléonore Mine area.

Rock units belonging to the La Grande Subprovince west of the Opinaca-La Grande comprise most of the Éléonore Mine area and host the Roberto deposit. The Roberto deposit is hosted in polydeformed greywacke units in contact with aluminosilicate-bearing greywacke and thin conglomerate units. The 1.9 kilometres long crescent shape of the deposit is believed to be the result of F2 folding. To date, mineralization has been intersected to a vertical depth of 1,400 metres. Gold-bearing zones are generally 5 to 6 metres in true thicknesses, varying from 2 metres to more than 20 metres locally. All zones remain open at depth.

Information from production drilling and underground mapping has shown that folding in the southern area edge of the main shoot is tighter than previously interpreted. The close folding that resulted in increased mining dilution during 2015 seems to be limited to within a 50 metres corridor.

The numerous subparallel mineralized zones are characterized by gold-bearing quartz-dravite-arsenopyrite veinlets, contained within quartz-microcline-biotite-dravite-arsenopyrite-pyrrhotite auriferous replacement zones. Sulphide concentrations within the auriferous zones vary from 2% to 5%, with the main sulphides being arsenopyrite, löllingite, pyrrhotite and pyrite. Relationships between the nearby diorite and pegmatite intrusions and the gold mineralization event are still unknown.

The knowledge of the deposit setting and lithologies, and of the mineralization style and its structural and alteration controls, is sufficient to support Mineral Resource and Mineral Reserve estimation. Prospects and targets are at an earlier stage of exploration, and the lithologies, structural, and alteration controls on mineralization are currently insufficiently understood to support estimation of Mineral Resources.

Exploration

Exploration in support of mine development has included prospecting, mapping, ground induced polarization and magnetic surveys, a Hummingbird electromagnetic survey, grab and rock chip sampling, soil sampling, trench and channel sampling, core drilling, metallurgical test work, Mineral Resource and Mineral Reserve estimates, baseline environmental, geotechnical and hydrological studies, and technical studies. The exploration programs completed to date are appropriate to the style of the deposits and prospects within the Éléonore Mine. The exploration and research work support the genesis and affinity interpretations. There is considerable remaining exploration potential in the vicinity of the current mining operations.

Until the summer of 2017, the main focus of the exploration activities was to extend the Roberto deposit at depth and laterally to increase Mineral Reserves. The greater Éléonore area outside the mining lease were not subject to significant exploration work until late 2016. From 2016 onward, extensive mapping, trenching, induced polarisation, till sampling and some drilling have been conducted over the Éléonore Mine area. Several targets have been identified and advanced. Exploration is planned to continue with drilling of some identified targets with accelerated programs planned for 2019 to 2020.

Drilling

As of November 30, 2018, a total of 10,133 surface and underground drill holes (approximately 1,523,791 metres) had been completed by Osisko and Goldcorp. Of these, a total of 351 holes (105,635 metres) were completed by Osisko and 9,782 holes (1,418,156 metres) by Goldcorp.

Drilling includes 1,436,883 metres of exploration and delineation drilling; 70,966 metres of geotechnical drilling; 1,281 metres for hydrological/water bore purposes; and 1,119 metres for metallurgical purposes. Condemnation drilling as well as drilling to support the locations of planned infrastructure was completed from May 1, 2010 to October 31, 2012, for a total of 13,542 metres. Exploration drilling between 2017 and 2018 aimed to better define the mineralized zones between 400 metres and 1,300 metres below surface. This drilling remains ongoing. Results of the drilling appear to confirm the continuity of the geological model as interpreted. Since January 2013, exploration and delineation drilling has been exclusively done from underground infrastructure.

All core holes were drilled on sections spaced approximately 25 metres apart in most parts of the deposit. Drill hole spacing of 25 metres by 25 metres occurs over the bulk of the orebody to a depth of approximately 1,200 metres below surface. Below 1,200 metres, down to approximately 1,300 metres, a core hole spacing of 100 metres by 100 metres is usually observed. Only a few drill holes have been drilled below 1,200 metres. The deeper boreholes intersected the mineralized horizons at a depth of approximately 1,580 metres below surface. For definition drilling, drill hole spacing is generally 12.5 metres by 12.5 metres inside the existing 25 metre drill spacing, as permitted by the mine development schedule. In 2017, infill drilling at a 25 metre by 25 metre drill spacing was completed in Horizon 5 and Horizon 6, in the central portion (Main Ore Shoot and South Ore Shoot). Definition drilling at 12.5 metre by 12.5 metre spacing commenced late in 2017 in Horizon 5 with the opening of the 950 and 980 haulage drift and is ongoing.

Standardized logging forms and geological legends were developed for the Éléonore Mine in acQuire database software. Rock quality designation is completed in sequence prior to geological logging and in the pre-feasibility period; full geotechnical logging was completed on some drill holes. Geological logging use standard procedures and collect information on mineralization, lithological breaks, alteration boundaries, and major structures. All drill core is photographed. Some drill holes are oriented for structural measurements. Core recovery is acceptable for all drill programs.

Upon completion of a hole, surface drill hole collars were surveyed using a differential global position system instrument by in-house technicians. Underground drill holes are surveyed using a Leica TS15 robotized station.

Downhole surveys are carried out by the drill contractor for dip and deviation using a Reflex instrument.

Drill data are typically verified prior to Mineral Resource and Mineral Reserve estimation by running a software program check.

Sample intervals are determined by the geological relationships observed in the core and vary between 0.3 metres and 1.25 metres. An attempt is made to terminate sample intervals at lithological and mineralization boundaries.

Specific gravity data were collected by our personnel until the end of 2011. The specific gravity database contains 11,923 specific gravity results that were determined on core samples. A specific gravity of 2.77 was used for all veins. The specific gravity database is currently sufficient to provide a reliable assessment of the variability of the specific gravity across the deposit and across the various rock types.

The quantity and quality of the lithological, geotechnical, collar, and down-hole survey data collected during the exploration and infill drill programs completed by Osisko and Goldcorp are sufficient to support Mineral Resource and Mineral Reserve estimation.

Sampling, Analysis and Data Verification

Exploration and infill core samples were analyzed by independent laboratories using industry-standard methods for gold analysis, including but not limited to.

- Between January 2007 and April 2014, ALS Chemex Labs Ltd. ("**ALS Chemex**") in Val-d'Or, Quebec was the primary laboratory, which is accredited under ISO 17025 and 9001/2008 and independent of Goldcorp.
- Between April 2014 and February 2017, exploration and infill sample preparation and assay were performed by Accurassay Laboratories Inc. ("**Accurassay**") in Rouyn-Noranda, Québec, which is accredited under ISO 17025 and independent of Goldcorp.
- Between September 2017 and April 2018, exploration and infill sample preparation and assays were performed by Swastika Laboratories Ltd. ("**Swaslabs**") in Swastika, Ontario, which is accredited under ISO 17025 and independent of Goldcorp.

- From April 2018 to date, Activation Laboratories Ltd. (“**Actlabs**”) has been used as the primary laboratory. Laboratory locations used include Ancaster, Timmins, Thunder Bay and Geraldton, Ontario. These laboratories hold either ISO 9001 or ISO 17025 accreditations and are independent of Goldcorp.
- Our in-house laboratory started operation in February 2014 and began to process muck, chips and definition drilling samples. The in-house laboratory has a total capacity of approximately 500 samples per day. Overflow and other production samples were sent to ALS Chemex, Accurassays, Swaslabs or Actlabs. During the period from February to September 2017, the mine laboratory acted as the primary laboratory for definition drill sample

Metallurgical testwork has been done at a number of laboratories, but was primarily performed by SGS Laboratories. Sample preparation for samples that support Mineral Resource and Mineral Reserve estimation has followed a similar procedure for all Osisko and Goldcorp drill programs. The preparation procedure is in line with industry-standard methods for a clastic sediment-hosted stockwork-disseminated gold deposit in an orogenic setting.

The primary gold analytical method was fire assay with either an atomic absorption spectrometry finish or microwave plasma atomic emission spectroscopy finish. Depending on the external laboratory, values above either 3.0 g/t gold or 10 g/t gold received a gravimetric finish. The in-house laboratory re-assays above 34 g/t gold with a gravimetric finish.

ALS Chemex sample preparation comprised drying and crushing to 70 to 90% passing 2 millimetres and pulverizing to 85% passing 75 micrometres. Gold assays were performed by standard fire assay with an atomic absorption spectroscopy finish. For assay results equal or above 3.0 g/t gold, samples are re-assayed with a gravimetric finish. ALS Chemex reported an upper limit of 10 g/t gold and a detection limit of 0.005 g/t gold for atomic absorption spectroscopy analyses. No other elements were routinely requested for assay.

Sample preparation at the internal laboratory consists of crushing to 75% <10 mesh and pulverising to 85% passing 200 mesh. Gold assays are performed by using a 30 gram fire assay with a microwave plasma–atomic emission spectrometry finish. For assay results above 34.0 g/t gold, samples are re-assayed with a gravimetric finish. The internal laboratory reports an upper limit of 34 g/t gold and a detection limit of 0.01 g/t gold for microwave plasma–atomic emission spectrometry analyses.

Accurassay sample preparation procedure consisted of drying and crushing to 85% <10 mesh, followed by pulverizing to 85% passing <200 mesh. Gold assays are performed by standard fire assay with an atomic absorption spectroscopy finish. Accurassay reports an upper limit of 10 g/t gold and a detection limit of 0.005 g/t for atomic absorption spectroscopy analyses. No other elements are routinely assayed.

Swaslabs sample preparation procedure consisted of drying and crushing to a minimum 75% passing 10 mesh and pulverized to 85% passing 200 mesh. Gold assays are performed using a 30 g fire assay with a microwave plasma atomic emission spectroscopy (MP-AES) finish. For assay results above 10.0 g/t gold, samples are re-assayed with a gravimetric finish.

SGS sample preparation consisted of drying and then jaw-crushing to 75% <10 mesh and a 400 to 500 g sub-sample is normally taken to be pulverized. Samples are pulverized to 85% passing 200 mesh. Gold assays are performed by standard fire assay on a 50 g sample with an AA finish. For assay results equal or above 3.0 g/t gold, samples are re-assayed with a gravimetric finish. SGS reports an upper limit of 10 g/t gold and a detection limit of 0.005 g/t gold for AA analyses.

Actlabs sample preparation procedure consisted of drying and crushing to 80%+ passing -10 mesh. A 250 g subsample is taken by riffle splitter and pulverized to 85%+ passing -200 mesh. For Goldcorp samples from 2014, 2015 and 2018, gold assays are performed by standard fire assay with an AAS finish. Values above 3.0 g/t Au receive a gravimetric finish.

The collected sample data adequately reflect deposit dimensions, true widths of mineralization, and the style of the deposits.

Osisko and Goldcorp maintained a QA/QC program for the Éléonore Mine. This comprised the submission of analytical standard reference materials, duplicates and blanks. QA/QC submission rates meet industry-accepted standards of insertion rates. No material sample biases were identified by the QA/QC programs.

The results of the QA/QC programs did not indicate any problems with the analytical programs. Accordingly, we have concluded that the drill core gold analyses are acceptably accurate and precise to support Mineral Resource and Mineral Reserve estimation.

Sample security has relied upon the fact that the samples were always attended or locked in the logging facility. Chain-of-custody procedures consisted of filling out sample submittal forms that were sent to the laboratory with sample shipments to make certain that all samples were received by the laboratory. Boxes are individually identified, and core is measured to ensure correct sample definition. Core is stored at the core logging facility until it is logged by professional geologists. As soon as the logging is complete, the core is bagged in individual samples and put into pallets to be delivered to the laboratory. Current sample storage procedures and storage areas are consistent with industry standards.

The quality of the gold analytical data is sufficiently reliable to support Mineral Resource and Mineral Reserve estimation and that sample preparation, analysis, and security are adequate and generally performed in accordance with exploration best practices and industry standards.

A reasonable level of verification has been completed, and no material issues would have been left unidentified from the programs undertaken. Data verification programs completed on the data collected from the Éléonore Mine adequately support the geological interpretations, and the quality of the analyses and the analytical database, and therefore support the use of the data in Mineral Resource and Mineral Reserve estimation.

Mineral Processing and Metallurgical Testing

Metallurgical testwork has included chemical analyses, acid neutralization potential tests, semi-qualitative petrography, X-ray diffraction, comminution testwork (including standard bond, crushing work index, abrasion index, ball mill work index tests), semi-autogenous grind mill work index tests, Isamill signature plots, bench-scale flotation tests, Knelson/Laplante gravity-recoverable gold testwork, grade variability recovery testwork, establishment of a reagent suite, evaluation of intensive cyanide leach processing of flotation concentrates, cyanide leach tests on gravity tailings, cyanide backfill tests, pilot plant runs, cyanide destruction using the sulphur dioxide/air process, thickening and filtration tests.

Milling operations commenced in September 2014 and the first gold pour occurred in October 2014. Since 2014, more than 6.75 million tonnes of material from a wide variety of areas and depths has been processed. No correlation between metallurgical response and sample origin or position within the orebody has been established.

Current plans assume long-term average metallurgical recoveries of 92.0 to 92.5%, which are consistent with the results of previous testwork as well as operational experience.

Mineral Reserve and Mineral Resource Estimates

The following table sets forth the gold Mineral Reserve estimation for the Éléonore Mine effective December 31, 2018:

Proven and Probable Mineral Reserves ⁽¹⁾⁽²⁾⁽³⁾⁽⁴⁾⁽⁵⁾⁽⁶⁾

Category	Tonnes (millions)	Grade	Contained Metal
		Gold (grams per tonne)	Gold (millions of ounces)
Proven	3.65	5.97	0.70
Probable	14.14	5.61	2.55
Proven + Probable	17.78	5.69	3.25

Notes:

- (1) The Mineral Reserves for the Éléonore Mine set out in the table above have been reviewed and approved by Ms. Adrienne Rispoli, P.Eng, an employee at Goldcorp, and a qualified person under NI 43-101. The Mineral Reserves are classified as Proven and Probable, and are based on the CIM Definition Standards. Proven Mineral Reserves include stockpile material.
- (2) Mineral Reserves are based on a gold price of \$1,200 per ounce, an economic function that includes variable operating costs and metallurgical recovery of 93%, and a US\$ exchange rate of C\$1.30.
- (3) The global cut-off grade is 3.6 g/t (in situ). Total average US\$ operating costs in the peak years of the LOM (as defined below) 2018 are \$107.50 per tonne (mining: \$59.41 per tonne; processing: \$27.75 per tonne; G&A: \$20.34 per tonne).
- (4) An overall dilution of 15% is applied to the stopes using zero grade.
- (5) Mineral Reserves take into account mining recoveries that range from 85% to 95% depending on geotechnical risk.
- (6) Numbers may not add up due to rounding.

We are not aware of any material environmental, permitting, legal, title, taxation, socio-economic, marketing, political or other relevant factors that would reasonably be expected to materially affect the Mineral Reserve estimate that are not documented in the Éléonore Report. Factors that may affect the Mineral Reserve estimates are: geological complexity impacting grade; geotechnical and design parameters changes impacting dilution and mining recovery factors; lower mill recovery in new mining areas; fluctuations in commodity price and exchange rate; and mining costs assumptions.

The following table sets forth the gold Mineral Resource estimation for the Éléonore Mine effective December 31, 2018:

Measured and Indicated Mineral Resources ⁽¹⁾⁽²⁾⁽³⁾⁽⁴⁾⁽⁵⁾⁽⁶⁾ (excluding Proven and Probable Mineral Reserves)

Category	Tonnes (millions)	Grade	Contained Metal
		Gold (grams per tonne)	Gold (millions of ounces)
Measured	0.79	6.15	0.16
Indicated	2.39	4.67	0.36
Measured + Indicated	3.18	5.03	0.51
Inferred	3.19	5.76	0.59

- (1) The Mineral Resources for the Éléonore Mine set out in the table above have been reviewed and approved by Mr. Martin Perron, P.Eng., an employee at Goldcorp, and a qualified person under NI 43-101. The Mineral Resources are classified as Measured, Indicated and Inferred, and are reported using the CIM Definition Standards.
- (2) All Mineral Resources are reported exclusive of those Mineral Resources that were converted to Mineral Reserves. Mineral Resources that are not Mineral Reserves do not have demonstrated economic viability.
- (3) A minimum true thickness of 2.5 metres was applied for all Mineral Resource estimates, using the grade of the adjacent material when assayed or a value of zero when not assayed.
- (4) A top cut varying from 50 g/t to 140 g/t (80 g/t for the dilution envelope) was applied to assay grades prior to compositing grades for interpolation into model blocks using Ordinary Kriging (OK), and inverse distance weighting to the second power (ID2) methods and was based on 2 metre composites within a block model made of 5 metre long x 5 metre wide x 5 metre high blocks. Average specific gravity (SG) is 2.77.
- (5) Mineral Resources are reported using a 2.7 g/t gold cut-off grade, which is based on assumptions of a \$1,400 per ounce gold price, long-hole stoping underground mining methods, a life-of-mine metallurgical recovery of 93%, and a total mining cost of \$107.50/t (comprising the following costs: mining: \$59.41/t; processing: \$27.75/t; general and administrative (G&A) of \$20.34/t (LOM 2018).
- (6) Numbers may not add up due to rounding.

We are not aware of any material environmental, permitting, legal, title, taxation, socio-economic, marketing, political or other relevant factors that would reasonably be expected to materially affect the Mineral Resource estimate that are not documented in the Éléonore Report.

Key areas of uncertainty that may materially impact the Mineral Resource estimate include: geological complexity including folding and faulting of vein material between drill hole intercepts; commodity price assumptions; metal recovery assumptions; hydrological constraints; and rock mechanics (geotechnical) constraints.

There is upside potential for the estimates if mineralization that is currently classified as Inferred can be upgraded to higher-confidence Mineral Resource categories. Core drilling is currently underway in support of potential confidence category upgrades.

Mining Operations

Mining operations exploit a complex orebody that consists of 117 different mineralized lenses with variable geometries and proximities. The mining method at the Éléonore Mine is long-hole stoping (down-hole drilling) longitudinal retreat with consolidated backfill (pastefill) or unconsolidated rockfill. Operations have converted from using the longhole transverse mining method that was initially proposed to a longitudinal longhole retreat stoping method because that method is better suited to the orebody geometry.

For mine scheduling purposes, the vertical extent of the orebody is subdivided into two parts: the upper part of the orebody located between 65 metres and 650 metres below surface (referred to as the upper mine), and the lower part of the orebody located between 650 metres and 1,370 metres below surface (referred to as the lower mine). Dividing the orebody into two mining sectors and seven mining horizons has accelerated the production start-up.

Mining started from two horizons, the 440 metre Level and the 650 metre Level, and expanded to cover from the 110 metre Level to the 980 metres Level from surface. The current mine plan assumes that all the ore and waste from Horizon 1 (80 metre Level to 230 metre Level) will be trucked to the surface as will material from the top of Horizon 2 (260–290 metre Level). Ore and waste from Horizons 2, 3, 4 and 5 (320–980 metre Level) will be either dumped down an ore pass (Horizon 2 and Horizon 3) or trucked to the 650 metre Level and hoisted by the production shaft. We are expanding the material handling system in the lower mine at the 1140 metre Level shaft station to support mining operations in Horizons 5 to 7 in 2020.

An average production rate of 1,050 tonnes per day per stope is used throughout the mine. Currently, rates are between 800 and 2,500 tonnes per day per horizon, excluding panel sequence beginnings and ends. The material handling system and producing horizons are capable of meeting an average 6,600 t/d production rate.

Studies to increase and sustain the production rate will be conducted as more drilling information becomes available. Based on the current Mineral Reserves, the planned operation has an eight-year mine life to 2026.

The production shaft excavation is complete to 1,190 metre depth, and the surface decline is progressing well, with the elevation in October 2018 being 1,130 metres from surface. The Gaumond shaft is completed to a depth of 715 metres and is only used for ventilation purposes.

The decline is currently used as the air exhaust and will continue to be so used when the final depth is reached and the ramp is complete. The main fresh ventilation raises are the Gaumond and production shafts. From both shafts, air is distributed into two internal ventilation raises, one located in the northern mine area, the second in the southern mine area. Currently, the ventilation on demand (VOD) system is fully operational.

The permanent pumping system is designed to be upgradable depending on the total water infiltration in the mine and also the mine plan. The system is designed to pump dirty water to the surface and consists of two main pumping stations on the 400 metre level and 650 metre level.

Stope widths vary from 2.5 to 20 metres, have an average length of 25 metres, a maximum length of 45 metres, and can reach 30 metres in height. Ground support consists of various combinations of rebar bolts, friction bolts, D-bolts, cables, screen and shotcrete depending on the rock quality and particular requirements of each heading.

Stopes are backfilled with pastefill. Unconsolidated backfill is used whenever possible in order to avoid hoisting waste rock to the surface. The current paste backfill mixture consists of 70% mill tailings, 25% fine sulphide concentrate, and 4 to 7% binder. The sulphide tailing concentration can reach as much as 25% without having an effect on the paste strength.

A fully-mechanized mining equipment fleet is used. Equipment includes scoop trams, dump trucks, mine service and personnel vehicles, jumbo drills, bolting platforms, scissor lifts, land cruiser and forklifts. The mine and fleet designs are appropriate for the Mineral Reserves defined and the selected throughput rate.

There is potential to extend the mine life and potentially sustain a 7,000 tonnes per day throughput rate if some or all of the Inferred Mineral Resources identified within the life-of-mine ("LOM") production plan ("LOMP") can be upgraded to higher confidence Mineral Resource categories, and eventually to Mineral Reserves. Mineralization remains open in the northern and southern extents of the Roberto orebody as well at depth. The deepest drill hole encountering mineralization was at 1,500 metre depth; the current mine plan extends to 1,370 metre depth.

As part of day-to-day operations, we will continue to undertake reviews of the mine plan and consideration of alternatives to and variations within the plan. Alternative scenarios and reviews may be based on ongoing or future mining considerations, evaluation of different potential input factors and assumptions, and corporate directives.

Processing and Recovery Operations

Comminution consists of conventional three-stage crushing circuit followed by a single stage of closed-circuit ball milling, so that 80% (P80) is smaller than 65 micrometres. Within the ball milling circuit, a gravity concentration circuit consisting of two Knelson Concentrators recovers coarse liberated gold, which is then leached in an Acacia reactor.

Grinding circuit product is fed to a flotation circuit for separation of sulphide minerals into a sulphide-rich concentrate. The flotation concentrate, which contains most of the gold, is reground so that 80% P80 is smaller than 15 micrometres being subjected to pre-oxidation and cyanidation. The flotation tails, which still contains a significant amount of gold, are also subjected to cyanidation in a separate circuit.

In both cases, gold in solution is recovered by dedicated in carousel CIP circuits (one for each leach circuit). Loaded carbon recovered from each CIP circuit is then stripped in a Zadra stripping circuit. Gold from the gold-loaded pregnant solutions (including the one from the Acacia reactor) is then recovered by electrowinning and melted into doré bars. Carbon is regenerated and returned to the CIP circuits.

The tails from each cyanidation circuit are detoxified in a conventional sulphur dioxide/air cyanide destruction circuit. Sulphide tailings, along with a portion of non-sulphide tailings, are returned to the underground mine in the form of paste backfill. The remaining non-sulphide tailings are filtered and trucked to the tailings management facility ("TMF"). The TMF is completely lined and designed for collection of contact water, which is sent to treatment. The TMF's current design allows for storage of 22 Mt of tailings, which is sufficient for the current LOM.

The crushing area is designed for a capacity of 8,500 tonnes per day, including waste crushing (1,500 tonnes per day), while the other plant areas are designed for a processing capacity of 7,000 tonnes per day at 95% availability (2.55 Mt/a).

Infrastructure, Permitting and Compliance Activities

The James Bay region is surrounded by extensive hydroelectric facilities and associated infrastructure, the closest of which are the Sarcelle hydroelectric facility located 40 kilometres due west of the Éléonore Mine on the Opinaca Reservoir and the Eastmain Dam located 70 kilometres to the south. Power is supplied by Hydro-Québec through a 120 kilovolt overhead electrical power line that was supplied and installed by Hydro-Québec specifically for the Éléonore Mine. A 120/25 kilovolt substation on site distributes the power required for the mining infrastructure.

Key infrastructure on site includes the underground mine, a processing plant, temporary waste rock storage facilities, TME, fuel storage and distribution facilities, industrial water treatment plant (IWTP), a permanent camp that can accommodate 400 people, an administration building, warehouse and garage facilities, assay laboratory, airstrip, and a concrete plant.

Mining-related infrastructure comprise the Gaumond shaft, the production shaft, a seven kilometre long access ramp, a shaft loading station, ore and waste passes, ore and waste storage bins, a rock breaker/grizzly arrangement, a transfer drift, an exhaust raise, the mine ventilation system and a mine dewatering system.

The main process infrastructure consists of a crushing plant, ore storage bins, a grinding and gravity gold recovery circuit, a flotation circuit, a flotation tails cyanidation and CIP circuit, a flotation concentrate regrinding, cyanidation and CIP circuit, a Zadra stripping circuit, a gold refinery, concentrate and tailings dewatering circuits and a paste backfill system.

We have completed baseline studies in support of the Strategic Environmental Assessment (SEA; or ESIE in French) and is carrying out continuous monitoring studies to support project permitting and various commitments. For the Éléonore Mine, the major issues identified include the potential impacts on the environment, the proper management of tailings and waste water, access (roads, airports), social acceptability and management of the post-reclamation site. These issues have been addressed and mitigated through a combination of baseline data collection, appropriate engineering and project design studies, and public consultation.

The Éléonore Operations currently hold all required permits to operate, including environmental permits. Permits are renewed as required. Environmental liabilities associated with the Project are those expected to be associated with an underground mine in Northern Canada.

Key elements for the mine operations include the proper management of tailings and waste water, access (roads, airports), social acceptability and post-reclamation management. A sustainability management system is in place, addressing these elements and allowing rigorous management. We are of the opinion that these issues have been addressed and mitigated through a combination of baseline data collection, appropriate engineering and project design studies, and public consultation. The Éléonore Mine operations currently holds all permits required to operate, including environmental permits.

The Éléonore Mine operations are located on traditional family territories of the Cree Nation of Wemindji, and within the Municipality of Eeyou-Istchee-James Bay. The operations are located entirely in Cree territory, or Eeyou Istchee, on Category III lands belonging to the Quebec Government and subject to the James Bay and Northern Quebec Agreement (JBNQA). A collaboration agreement was signed with the Cree Nation of Wemindji in February 2011.

Capital and Operating Costs

Capital and operating cost estimates were prepared by our staff. The capital cost estimates are based on a combination of quotes, vendor pricing, and our experience with similar-sized operations. The capital costs are based on the 2018 mine construction data and budgetary figures and quotes provided by suppliers. Capital cost estimates include funding for infrastructure, mobile equipment, development, and miscellaneous costs. Infrastructure requirements were incorporated into the estimates as needed. Sustaining capital costs reflect current price trends. The total LOM capital estimate is \$389 million, comprising \$365 million of sustaining capital and \$24 million of expansionary capital.

Area	Life-of-Mine (US\$ million)
Sustaining	\$365
Expansionary	\$24
Total	\$389

Note: Estimate is from 2019 for LOM. Totals may not sum due to rounding.

Operating cost estimates are based on the 2018 LOM budget, which includes estimates from first principles for major items and allowances or estimates for minor costs. Labour cost estimation is based on our 2018 salary scale and fringe benefits in force. Mining consumables are based on 2018 costs and contracts. The Éléonore Mine is located at a remote site. Costs for camp accommodation, meals, employee travel, and site security were included in the G&A component of the estimate. An average overall unit cost of \$113.38 per tonne was estimated, comprising \$29.29 per tonne for processing, including backfill and tailings treatment and transportation, \$62.19 per tonne for mining operations, and \$21.89 per tonne for G&A. Exploration expenditures are not included in the operating costs.

Area	Life-of-Mine (\$ per tonne)
Process Plant	\$29.29
Mining Operations	\$62.19
G&A	\$21.89
Total	\$113.38

Note: Estimate is from 2019 for LOM. Totals may not sum due to rounding.

Exploration, Development and Production

The average production rate for 2018 was approximately 5,000 tonnes per day, with the second half of 2018 in ramp-up phase and finishing the year at over 6,500 tonnes per day. The mine is expected to achieve the LOM plan peak years average production rate of 6,600 tonnes per day in 2019.

The exploration drilling program in 2019 is a two-phase work program, which consists of exploration and delineation drilling. The first work phase is to investigate zones within the Roberto area that could be rapidly evaluated for potential for Mineral Resource estimation and potential conversion to Mineral Reserves once drill information is available. The second work phase is to support potential conversion of Mineral Resources to Mineral Reserves. Drilling at depth and laterally is also required to identify mineralization that may support estimation of additional Mineral Resource.

The two work phases are independent and can be conducted concurrently. Neither phase is dependent on completion of the other.

At the Éléonore Mine, gold production for 2019 is expected to be in the range of 350,000 to 380,000 ounces. See "Risk Factors – Our financial projections rely on estimates of future production and estimates of future production may vary, which could have a negative impact on our future cash flows, business, results of operations and financial condition".

Peñasquito Mine, Mexico

The Peñasquito Mine, wholly-owned by Goldcorp, is an open pit mining operation located in north-central Mexico with two separate process facilities, an oxide ore facility and a plant to process sulfide ore. The scientific and technical information included in the following section has been derived, in part, from the technical report entitled “Peñasquito Polymetallic Operations, Zacatecas State, Mexico, NI 43-101 Technical Report” (the “**Peñasquito Report**”) dated effective June 30, 2018 prepared by Dr. Guillermo Pareja, P.Geo., Victor Vdovin, P.Eng. and Peter Lind, P.Eng., each of whom is a qualified person under NI 43-101.

Property Description, Location and Access

The Peñasquito Mine is wholly-owned by our subsidiary, Minera Peñasquito S.A. de C.V. (“**Minera Peñasquito**”). The Peñasquito Mine is situated in the western half of the Concepción Del Oro district in the northeast corner of Zacatecas State, Mexico, approximately 200 kilometres northeast of the city of Zacatecas. The mine site is accessed via a turnoff from Highway 54 approximately 25 kilometres south of Concepción Del Oro. There is an airport on site.

The Peñasquito Mine is comprised of 20 mining concessions (approximately 45,823 hectares), held in the name of Minera Peñasquito. Concessions were granted for durations of 50 years and a second 50-year term can be granted if the applicant has abided by all appropriate regulations and makes the application within five years prior to the expiration date. Obligations which arise from the mining concessions include performance of assessment work, payment of mining taxes and compliance with environmental laws. Duty payments for the concessions have been made as required. Minimum expenditures, pursuant to Mexican regulations, may be substituted for sales of minerals from the mine for an equivalent amount. We hold additional tenure in the greater Peñasquito Mine area (within about 200 to 300 kilometres of the Peñasquito Mine infrastructure), which is under application, is granted, or is part of joint ventures with third parties.

Mining concessions give the holder the right to mine within the concession boundary, sell the mining product, dispose of waste material generated by mining activities within the lease boundary, and have access easements. Surface rights near the Chile Colorado and Peñasco open pits are held by four ejidos, as well as certain private owners. We have signed current land use agreements with all the ejidos and the relevant private owners. Under current agreements with the ejidos, payments are made to the ejidos on an annual basis, in addition to certain upfront payments that have already been made.

Agreements and Royalties

On July 24, 2007, Goldcorp and Wheaton Precious Metals Corp. (then Silver Wheaton Corp.) entered into a streaming transaction where Wheaton Precious Metals Corp. acquired 25% of the silver produced over the life of the Peñasquito Mine for an upfront cash payment of \$485 million, and a per ounce cash payment of the lesser of \$3.90 and the prevailing market price (subject to an inflationary adjustment commencing in 2011), for silver delivered under the contract.

A 2% net smelter return royalty is owed to Royal Gold Inc. from both the Chile Colorado and Peñasco locations of the Peñasquito Mine. The Mexican Government, since January 1, 2014, levies a 7.5% mining royalty that is imposed on earnings before interest, taxes, depreciation, and amortization. There is also a 0.5% royalty on precious metals revenue (applicable to precious metals mining companies) made effective as of January 1, 2014.

Environment, Permitting and Socio-Economics

Environmental liabilities are limited to those that would be expected to be associated with a polymetallic mine, where production occurs from open pit sources, and where disturbances include mining operations, roads, site infrastructure, heap leach, and waste and tailings disposal facilities. A closure and reclamation plan has been prepared for the mine site. We hold the appropriate permits under local, state and federal laws required for mining operations.

History

The earliest recorded work in the Peñasquito Mine consists of excavation of a shallow shaft and completion of two drill holes in the 1950s. Kennecott Canada Explorations Inc. through its Mexican subsidiary, Minera Kennecott S.A. de C.V. ("**Kennecott**"), acquired initial title to the Peñasquito Mine and commenced exploration in 1994. Regional geochemical and geophysical surveys were undertaken in the period 1994 to 1997. This work led to the early discovery of two large mineralized diatreme breccia bodies, the Outcrop (Peñasco) and Azul Breccias.

In 1998, Western Copper Holdings Ltd. ("**Western Copper**") acquired a 100% interest in the Peñasquito Mine from Kennecott. Exploration efforts were focused on the Chile Colorado zone and the Azul Breccia pipe targets. Western Copper optioned the property to Minera Hochschild S.A. ("**Hochschild**") in 2000. Hochschild completed core drilling into the Chile Colorado anomaly, but subsequently returned the property to Western Copper. From 2002 to 2009, Western Copper completed additional core and reverse circulation drill holes and undertook a scoping-level study, a pre-feasibility study, and a feasibility study in 2003, 2004, and 2005 respectively. The feasibility study was updated in 2006. Under the assumptions in the studies, the Peñasquito Mine returned positive economics. In 2003, Western Copper underwent a name change to Western Silver Corporation ("**Western Silver**"). Glamis acquired Western Silver in May 2006, and we subsequently acquired the combined company in November 2006.

During 2005, a drill rig was used to perform geotechnical field investigations to support the design of the heap leach facility, waste rock piles, tailings impoundment and process plant. Standard penetration tests were performed. Construction in the Peñasquito Mine commenced in 2007. In October 2009, the first lead and zinc concentrates were produced and concentrate shipment to smelters commenced with first sales recorded in November 2009.

Geological Setting, Mineralization and Deposit Types

Deposits currently mined within the Peñasquito Mine operations are considered to be examples of breccia pipe deposits developed as a result of intrusion-related hydrothermal activity.

The regional geology of the operations area is dominated by Mesozoic sedimentary rocks, which are intruded by Tertiary stocks of intermediate composition (granodiorite and quartz monzonite) and overlain by Tertiary terrestrial sediments and Quaternary alluvium. The Mesozoic sedimentary rocks comprise a >2.5 kilometres thick series of marine sediments deposited during the Jurassic and Cretaceous Periods with a 2,000 metre thick sequence of carbonaceous and calcareous turbiditic siltstones and interbedded sandstones underlain by a 1,500 metre to 2,000 metre thick limestone sequence.

Large granodiorite stocks are interpreted to underlie large portions of the mineralized areas within the Concepción Del Oro District, including the Peñasquito Mine. Slightly younger quartz–feldspar porphyries, quartz monzonite porphyries, and other feldspar–phyric intrusions occurring as dikes, sills, and stocks cut the sedimentary units. The intrusions are interpreted to have been emplaced from the late Eocene to mid-Oligocene.

The two diatreme pipes, Peñasco and Brecha Azul, are the principal hosts for gold–silver–zinc–lead mineralization at the Peñasquito Mine. The pipes flare upward, and are filled with breccia clasts in a milled matrix of similar lithological composition. The larger diatreme, Peñasco, has a diameter of 900 metres by 800 metres immediately beneath surface alluvial cover. The second, and smaller, diatreme, Brecha Azul, is about 500 metres in diameter immediately below alluvium. The diatremes are surrounded by coalesced halos of lower grade, disseminated sphalerite, galena, and sulphosalts containing silver and gold.

Chile Colorado is a mineralized stock work located southwest of Brecha Azul, in sediments of the Caracol Formation. It has a geometry of approximately 600 metres by 400 metres immediately beneath the surface alluvial cover, and it extends to at least 500 metres below surface.

Both of the breccia pipes lie within a hydrothermal alteration shell consisting of a central sericite–pyrite–quartz (phyllic) alteration assemblage, surrounding sericite–pyrite–quartz–calcite assemblage, and peripheral calcite–pyrite alteration halo.

Manto-style sulphide replacements of carbonate strata have been discovered beneath the clastic-hosted disseminated sulphide zones, and adjacent to the diatreme pipes. The mantos consist of semi-massive to massive sulphide replacements of sub-horizontal limestone beds, as well as cross-cutting chimney-style, steeply dipping, fracture and breccias zones filled with high concentrations of sulphides.

Garnet skarn-hosted polymetallic mineralization has been identified at depth between the Peñasco and Brecha Azul diatremes. The skarn has horizontal dimensions of approximately 1,000 metres by 1,200 metres and is open at depth.

Exploration

Work undertaken included reconnaissance geological inspections, regional-scale geochemical and geophysical surveys (including gravity, controlled source audio frequency magnetotellurics, reconnaissance induced polarization, scalar induced polarization, airborne radiometrics, magnetics and ground magnetics), rotary air blast, reverse circulation and core drilling.

The exploration programs completed to date are appropriate to the style of the deposits and prospects within the Peñasquito Mine and support the genetic and geological interpretations. During 2018 regional drilling was undertaken at the Santa Rosa and Santa Cruz deposits - at this stage drill density was insufficient to determine potential resources.

Drilling

Drilling completed on the Peñasquito Mine area for the period of 1994 to June 2018 comprised 1,774 drill holes (853,982 metres). Drilling has focused on the exploration and delineation of three principal areas: the Chile Colorado Zone, the Brecha Azul Zone and the Peñasco Zone.

In 2018, in-fill drilling at the Peñasquito Mine included 97 holes (32,865 metres). Drill hole spacing is generally on 50 metre sections in the main deposits with tighter spacing for infill drilling in the Peñasco pit, spreading out to 400 metre spaced sections in the condemnation zones. Drill spacing is wider again in the areas outside the conceptual pit outlines used to constrain Mineral Resources. Drilling covers an area approximately 11 kilometres east–west by 7 kilometres north–south with the majority of drill holes concentrated in an area 2.1 kilometres east–west by 2.8 kilometres north–south.

Drill logs record deposit-specific information, including lithologies, breccia type, fracture frequency and orientation, oxidation, sulphide mineralization type and intensity, and alteration type and intensity. From mid-2013, logs have been recorded electronically and are uploaded directly to the project database.

Drill traces were down-hole surveyed using a single shot, through the bit, survey instrument. All drill holes have been down-hole surveyed except 51 Western Silver reverse circulation drill holes and 11 of the 71 Kennecott drill holes. Use of a gyroscopic survey instrument began in 2012 when Silver State Survey Inc. (“**Silver State Survey**”) was contracted. In the first 800 metres of any drill hole, Silver State Survey takes a measurement at 50 metre intervals and at the end of the drill hole.

The quantity and quality of the lithological, geotechnical, collar, and down-hole survey data collected during our exploration and infill drill programs are sufficient to support Mineral Resource and Mineral Reserve estimation.

Geotechnical Drilling

Geotechnical drilling in support of infrastructure locations were completed as follows:

- Major Drilling Co. (2004): eight core holes completed in the area of the planned Chile Colorado pit and three core holes in the planned Peñasco pit area for a total 11 core holes (4,126 metres).

Core holes were oriented at an angle of 60° to the horizontal and were sited to intersect the November 2005 design basis pit wall one-third of the ultimate wall height above the base of the final pit level. Core orientation was accomplished using two independent methods: clay impression and a mechanical down-hole system referred to as Corientor™. Field point load tests were completed for each core run to estimate the unconfined compressive strength of the intact rock;

- Estudios Especializados de Mecánica de Suelos, S.A. de C.V. (2005): geotechnical field investigations to support the design of the heap leach facility, waste rock piles, tailings impoundment and process plant. Standard penetration tests were performed;
- Adviser Drilling, S.A. de C.V. (2010): oriented core program with seven holes (3,014.17 metres) completed to provide information on the bedding orientations within the area planned for the Chile Colorado pit and identify structures that could affect the bench stability;
- Boart Longyear Drilling Services-Mexico and BDW (2013): seven hole program (1,856.25 metres), which focused on obtaining information on the bedding orientations in the north of the Peñasco pit. The drill holes were sited to provide geotechnical information for pit phase designs and for support of potential modification of pit wall slope angles in selected pit sectors. A total of 68 laboratory triaxial tests of intact rocks were performed and 52 direct shear tests to estimate the unconfined strength of the intact rock. The rock quality designation model was updated with the recent drill information, and a total of 1,211 holes were used. A total of 1,348 holes and 13 geomechanical cells were used to construct a model of bedding orientation in the Caracol Formation;
- Call & Nicholas Inc (2015): performed intact strength testing on 96 samples of core, taken from the 2014 drilling campaign, from the Brecha Peñasco to determinate the intact shear strength and elastic properties;
- Layne de México (2015): oriented core program with eight holes (3,240.6 metres), which focused on obtaining information of the bedding orientations in the north of Peñasco pit for Ph-7, Caracol Formation. These holes were sited according to SRK recommendations. SGS CIMM T&S Laboratory tested 101 samples to determine the intact shear strength and elastic properties; and
- Layne de México (2016): oriented core program with nineteen holes (7,007.9 metres). These drill holes were sited to provide geotechnical information for pit phase designs (Ph-7, Ph-8, Ph-9), focused on design for final pit.

Metallurgical Drilling

Metallurgical drilling was first performed in 2003–2006, with 12 holes (3,853 metres) completed. Holes averaged 310 metres in depth. An additional 29 core holes were drilled in 2006 to 2012 (15,537 metres), which were typically 550 metres long. During 2013, 18 holes (9,156 metres) were completed, averaging 510 metres in length.

During 2016, characterization of organic carbon-bearing sedimentary ores was made through reverse circulation drilling of stockpiles.

In 2018, a stockpile drilling campaign was carried out on the Stock 5 organic carbon-bearing stockpile consisting of 86 holes (3,958 metres). The aim of the program was to better characterize the stockpile feed and relative deportment of carbon, gold, silver, lead, and zinc through carbon pre-flotation and the downstream metallurgical processes as the stockpile will be a significant feed source to the sulphide plant starting in the second half of 2018.

Geological and Geotechnical Logging

Logging of reverse circulation drill cuttings and core utilized standard logging procedures. Initial logging utilized paper forms, with data hand-entered into a database from the form. Logs recorded lithologies,

breccia type, fracture frequency and orientation, oxidation, sulphide mineralization type and intensity, and alteration type and intensity.

In July 2013, digital logging was implemented. Data are logged directly into acQuire using custom forms. Logs are stored on the mine server in an exploration database. Information now recorded includes lithology, alteration, minerals, structural features, oxidation description, and vein types.

Core was photographed; core photographs are retained on the mine data server. Video was recorded from drill collar to toe; these digital files are stored on hard discs.

Geotechnical logging for pit design purposes was typically completed at three metre intervals and recorded on CDs. For site location purposes, geotechnical logging included sample descriptions, sample numbers and visual classifications based on the united soil classification system. From 2010 onwards, all geotechnical logging has been stored in an acQuire database.

Collar Surveys

All drill hole collars are identified with a concrete monument, allowing all drill holes to be identified at a later date. The monument is placed directly over the collar on completion of each drill hole.

Prior to 2001, drill holes were located using chain-and-compass methods. From 2002 onwards, collar surveys have been performed by a qualified surveyor. Since preparation for mining operations commenced in 2007, all surveys have been performed using differential GPS instruments. The mine currently uses Trimble R-6 GPS instruments.

Deposit Drilling

Drilling is normally perpendicular to the strike of the mineralization. Depending on the dip of the drill hole, and the dip of the mineralization, drill intercept widths are typically greater than true widths.

Sampling, Analysis and Data Verification

Independent sample preparation and analytical laboratories used during the exploration, development and operational core drill programs on the project include ALS Chemex and Bondar Clegg (absorbed into ALS Chemex in 2001). The umpire (check) laboratories are Acme Analytical Laboratories Ltd. ("**Acme**") in Vancouver, and SGS Mexico. Laboratories are certified and independent of Goldcorp. The run-of-mine samples are assayed in an on-site mine laboratory that is not accredited. Sample collection and handling of core was done in accordance with industry standard practices, with procedures to limit sample losses and sampling biases. Reverse circulation drill cuttings were sampled at intervals of two metres. The standard core sample interval is 2 metres. Some samples are limited to geological boundaries and are less than 2 metres in length.

The sampling has been undertaken over a sufficient area to determine deposit limits, and the data collected adequately reflects deposit dimensions, true widths of mineralization, and the style of the deposits. The samples are representative of the mineralization and respect the geology of the deposits. The sample preparation method typically consists of drying, pulverizing and splitting to generate a 30 gram pulp for assay. Prior to 2003, the pulverization standard was 85% passing 75 micrometres; after 2003, samples were pulverized to a minimum of 85% passing 200 mesh. Standard fire assay procedures are used for analysis of gold. Inductively-coupled plasma analyses are used for silver, lead, zinc and deleterious elements.

QA/QC measures for our programs include submission of standard reference materials and blanks, and re-assay of a proportion of the samples.

Entry of information into databases has utilized a variety of techniques and procedures to check the integrity of the data entered. Geological data from early drill programs were entered into spreadsheets in a single pass.

All drill data from 2007 to July 2013 was entered from paper logging forms into Excel files before being imported into acQuire. Since July 2013, logging and recording of other drill hole data by geologists and technicians has been entered directly into acQuire on laptop computers, with the data subsequently imported into the main database.

Assays received electronically from the laboratories are imported directly into the database. Analytical certificates received since 2010 have been stored in the database and were validated via the acQuire software. Data are verified on entry to the database by means of built-in program triggers within the mining software. Checks are performed on surveys, collar co-ordinates, lithology data, and assay data.

The quality of the analytical data is sufficiently reliable to support Mineral Resource and Mineral Reserve estimation and sample preparation, analysis, and security are generally performed in accordance with exploration best practices and industry standards.

Mineral Processing and Metallurgical Testing

Mineralogical studies have been performed to increase the knowledge of the different ore types in the mine targeted to ensure the best possible treatment for each ore category and maximize the recovery. Metallurgical testwork focused on recovery of the key elements, lead and zinc, with co-recovery of gold and silver.

Various testwork programs have investigated comminution, flotation, heavy media separation, flowsheet variability schemes, concentrate filtration, dewatering, and regrind tests, modal and liberation analyses, and bottle roll and column cyanide leach extraction tests. Programs were performed that were sufficient to establish the optimal processing routes for oxide and sulphide ores, and supported estimation of recovery factors for the various ore types. The PLP has also investigated the metallurgical responses to treatment for additional gold and silver recovery from the zinc flotation tailings.

Over the life of mine gold and silver recovery from the oxide heap leach has stabilised. Recovery from the heap leach is currently fixed at approximately 59% for gold and 25.5% for silver in the LOM plan.

The mineralogical complexity of the Peñasquito Mine ore makes the development of mill processing models difficult as eight elements (gold, silver, lead, zinc, copper, iron, arsenic and antimony) are tracked through the process, and the models need to be robust enough to allow for changes in mineralogy and plant operations while giving reasonable predictions of concentrate quality and tonnage. The current models incorporate grade-recovery relationships and the impact of organic carbon on all ore types. Based on updated 2017 metallurgical recovery models the forecasted LOM average recoveries (including operation of the PLP circuit) are:

- Gold: 72.3%
- Silver: 87.6%
- Lead: 75.0%
- Zinc: 79.1%

All stated recoveries exhibit short-term variability around the expected LOM averages due to complex mineralogy and mining stages.

The carbon pre-flotation process enables the treatment of higher carbon-containing material without significant disruption to the existing lead, zinc, and future pyrite flotation process. Implementation of the circuit as an add-on to the current sulphide processing plant was completed during the second quarter of 2018.

After an extensive investigative program on the recovery of valuable metals in zinc tailings, the Peñasquito Mine has developed the pyrite leach process. The pyrite leach process circuit consists of: flotation of zinc tails to produce a rich gold-silver-pyrite concentrate; concentrate re-grind; concentrate leaching; precipitation; cyanide detoxification; and precious metals refining to produce doré bars as final

product. Implementation of this circuit as an add-on to the existing sulphide processing plant was completed during the fourth quarter of 2018.

Mineral Reserve and Mineral Resource Estimates

The following table sets forth the Mineral Reserve estimation for the Peñasquito Mine effective December 31, 2018:

Proven and Probable Mineral Reserves ⁽¹⁾⁽²⁾⁽³⁾⁽⁴⁾⁽⁵⁾⁽⁶⁾⁽⁷⁾⁽⁸⁾⁽⁹⁾⁽¹⁰⁾

Category	Tonnes (millions)	Grade				Contained Metal			
		Gold (g/t)	Silver (g/t)	Lead (%)	Zinc (%)	Gold (Moz)	Silver (Moz)	Lead (Mlb)	Zinc (Mlb)
Proven	372.77	0.58	34.67	0.34	0.77	6.92	415.47	2,803.62	6,314.23
Mill									
Probable	143.55	0.46	23.61	0.26	0.53	2.14	108.98	809.58	1,680.30
<i>Proven + Probable</i>	<i>516.32</i>	<i>0.55</i>	<i>31.59</i>	<i>0.32</i>	<i>0.70</i>	<i>9.07</i>	<i>524.45</i>	<i>3,613.20</i>	<i>7,994.53</i>
Proven	3.66	0.42	24.24	-	-	0.05	2.85	-	-
Heap Leach									
Probable	0.43	0.36	20.23	-	-	0.00	0.28	-	-
<i>Proven + Probable</i>	<i>4.09</i>	<i>0.42</i>	<i>23.82</i>	-	-	<i>0.05</i>	<i>3.13</i>	-	-

Notes:

- (1) Mr. Victor Vdovin, P. Eng., a Goldcorp employee, is the qualified person for, and has reviewed and approved, this estimate.
- (2) The Mineral Reserves are classified as Proven and Probable Mineral Reserves and are based on the CIM Definition Standards.
- (3) Based on a gold price of \$1,200 per ounce, a silver price of \$18.00 per ounce, a lead price of \$0.95 per pound and a zinc price of \$1.15 per pound; and an economic function that includes variable operating costs and metallurgical recoveries.
- (4) Prior to the pyrite leach circuit, the estimated recovery rate for the Peñasquito Mine (the "Mill") averages 59.50% for gold, 78.60% for silver, 75.00% for lead and 79.10% for zinc. After the pyrite leach circuit, the estimated recovery rate for the Mill averages 72.30% for gold and 87.60% for silver, with other metal recoveries unchanged. A pyrite leach gold recovery circuit is assumed to be operational late 2018. Recovery relationships of the ore types are very complex and can vary considerably from these averages.
- (5) The estimated metallurgical recovery rate for the Peñasquito Mine Heap Leach is 59.00% for gold and 25.50% for silver.
- (6) The Mineral Reserve cut-off is based on generating positive net smelter return on a block-by-block basis applying all revenue and associated costs. The incremental cost used for milled ore is \$12.61 per tonne, and for leach ore is \$6.00 per tonne, and includes all mill operating, administrative and sustaining capital costs. Other factors considered are product freight to market costs, smelter costs (including penalties) and royalties.
- (7) A forward sales contract for 25% of silver production exists with Wheaton Precious Metals Corp.
- (8) Tonnages are rounded to the nearest 10,000 tonnes; grades are rounded to two decimal places except for silver which is rounded to one decimal place.
- (9) Rounding as required by reporting guidelines may result in apparent differences between tonnes, grade and contained metal content.
- (10) Tonnage and grade measurements are in metric units. Contained gold and silver ounces are reported as troy ounces. Contained lead and zinc pounds are Imperial pound units.

Risk factors that can affect the Mineral Reserve estimates are: metal prices, exchange rate assumptions, mining, process, operating and capital cost assumptions; availability of water to support the process plant throughput assumptions; metallurgical recovery rates, capital project timelines, geotechnical and hydrogeological assumptions; social licence to operate and any additional modifications to the proposed changes to the taxation and royalty regime.

To support declaration of Mineral Reserves, an economic analysis is undertaken to confirm the economics based on Mineral Reserves over the mine life repays life-of-mine operating and capital costs. The mine was evaluated on an after-tax free cash flow basis.

The following table sets forth the Mineral Resource estimation for the Peñasquito Mine effective December 31, 2018:

Measured and Indicated Mineral Resources ⁽¹⁾⁽²⁾⁽³⁾⁽⁴⁾⁽⁵⁾⁽⁶⁾⁽⁷⁾⁽⁸⁾⁽⁹⁾⁽¹⁰⁾⁽¹¹⁾
(excluding Proven and Probable Mineral Reserves)

Category	Tonnes (millions)	Grade				Contained Metal			
		Gold (g/t)	Silver (g/t)	Lead (%)	Zinc (%)	Gold (Moz)	Silver (Moz)	Lead (Mlb)	Zinc (Mlb)
Measured	89.88	0.25	28.20	0.29	0.59	0.72	81.48	579.65	1,161.20
Indicated	95.86	0.24	22.74	0.29	0.49	0.73	70.08	609.99	1,044.22
Mill <i>Measured</i> + <i>Indicated</i>	185.74	0.24	25.38	0.29	0.54	1.46	151.56	1,189.63	2,205.42
Inferred	14.87	0.30	13.48	0.17	0.63	0.14	6.44	54.13	206.63
Measured	4.15	0.25	31.26	-	-	0.03	4.17	-	-
Indicated	8.91	0.26	23.00	-	-	0.07	6.59	-	-
Heap Leach <i>Measured</i> + <i>Indicated</i>	13.05	0.26	25.63	-	-	0.11	10.75	-	-
Inferred	0.02	0.34	4.61	-	-	0.00	0.00	-	-

Notes:

- (1) Dr Guillermo Pareja, P.Geo., a Goldcorp employee, is the qualified person for, and has reviewed and approved, this estimate.
- (2) Mineral Resources are classified as Measured, Indicated and Inferred Mineral Resources, and are based on the CIM Definition Standards.
- (3) Mineral Resources are exclusive of Mineral Reserves.
- (4) Mineral Resources are not Mineral Reserves and do not have demonstrated economic viability.
- (5) Based on commodity prices of \$1,400 per ounce gold, \$20.00 per ounce silver, \$1.05 per pound lead and \$1.25 per pound of zinc.
- (6) Mineral Resources were assessed for reasonable prospects of eventual economic extraction by confining the mineralization within an optimized pit shell.
- (7) The resource block model includes internal and contact dilution. The estimated metallurgical recovery rate for the Mill is assumed similar for both Mineral Resources and Mineral Reserves.
- (8) Mineral Resource cut-off determination methodology is similar to Mineral Reserves, except metal pricing as noted.
- (9) Tonnages are rounded to the nearest 10,000 tonnes; grades are rounded to two decimal places except for silver which is rounded to one decimal place.
- (10) Rounding as required by reporting guidelines may result in apparent summation differences between tonnes, grade and contained metal content.
- (11) Tonnage and grade measurements are in metric units. Contained gold and silver ounces are reported as troy ounces. Contained lead and zinc pounds are Imperial pound units.

Risk factors that can affect the Mineral Resource estimates are: metal prices and exchange rate assumptions; assumptions which are used in the Lerchs-Grossman shell constraining Mineral Resources, including mining, processing and general and administrative costs; metal recoveries; geotechnical and hydrogeological assumptions; and assumptions that the operation will maintain the social licence to operate.

Mining Operations

The Peñasquito Mine is a conventional, large scale, truck-and-shovel open pit mining operation. In 2018, the mine operations moved 35.2 million tonnes of mill ore and 6.9 million tonnes of heap leach ore, with total material movement of 207.4 million tonnes. The open pit operations will progress at a nominal annual mining rate of 200 million tonnes per year until the end of 2021, after which it continues to decline at a significant rate as the stripping ratios of ore to waste decrease.

The Mineral Reserve estimate for the operations is based on Measured and Indicated Mineral Resources. A four-step process is used to estimate the Mineral Reserves. The Peñasquito Mine contained metal block model is interpolated with a series of software scripts in which a net smelter return value is calculated for each block, based on recovery and marketing assumptions.

The Peñasquito Mine net smelter return block model then undergoes a process of "pit optimization" where Whittle mine planning software optimizes the potential future financial return for numerous intermediate pit shells, and defines the ultimate pit size and shape for each of the two deposits. The ultimate pit shell

offering the best economic results is selected, based on the defined parameters while respecting geotechnical limitations.

With the ultimate pit limits defined, practical design parameters are completed within a mine design software package. This process results in a series of minable cutbacks that together form the ultimate pit design for the deposit.

A series of potential production schedules are produced that are based on the practical sequencing of each cut-back, the mining equipment available, and operational limitations such as production rates, haulage distance and mill throughput capacity. From this process, which in most cases is iterative, a practical LOM production schedule is developed that tries to maximize the net present value and metal production, minimize operating and capital costs, and defines the annual mining, milling and metal production schedules.

The current mine plan is based on the 2018 Mineral Reserve estimate and will produce oxide and sulphide material to be processed through the existing heap leach facility and sulphide plant respectively over a 13-year mine life (2018–2030).

Dilution is accounted for in block models by ensuring the models have the appropriate change of support to produce a grade–tonnage curve that reflects the expected mining selectivity. Block models also incorporate anticipated contact dilution through the interpolation plan that utilizes both mineralization and waste samples within interpolation domains. Accordingly, no further dilution factors are needed to reflect the appropriate grade and tonnage distributions. Because the same models are used for both Mineral Reserves and Mineral Resources, dilution is incorporated in both estimates. Mineral Reserves and Mineral Resources are reported at 100% of the block model.

An ore stockpiling strategy is practiced. The mine plan considers the value of the blocks mined on a continuous basis combined with the expected concentrates quality. From time to time ore material with a lower net smelter return value will be stockpiled to bring forward the processing of higher-value ore earlier in the LOM. In some instances, the ore is segregated into stockpiles of known composition to allow for blending known quantities of material at the stockpile as required by the mill/customer. Stockpiling at Peñasquito Mine also allows for forward planning for ore quality to ensure optimal mill performance and consistent gold production to match, within the normal bounds of expected variability within the mine plan.

Processing and Recovery Operations

The Peñasquito Mine consists of a leach facility that processes a nominal 6,000 tonnes per day of oxide ore and a sulphide plant that can process 115,732 tonnes per day of sulphide ore. Mine construction commenced in 2007. Ore placement on the heap leach pad began in February 2008. On April 8, 2008, ore leaching was initiated, and the first gold pour occurred on May 10, 2008. In October 2009, the first lead and zinc concentrates were produced and concentrate shipment to smelters commenced with first sales recorded in November 2009.

For the milling throughput, the LOM plan assumes a nominal rate of 42.5 million tonnes per year until the end of 2029, and the heap leach pad will be stacked with incremental oxide ore as it is mined.

Run-of-mine oxide ore is delivered to the heap leach pad from the mine by haul trucks. Lime is added to the ore prior to the addition of the ore to the pad. Ore is placed in ten metre lifts and leached with cyanide solution. Pregnant leach solution is clarified, filtered, and de-aerated, then treated with zinc dust to precipitate the precious metals. The precipitated metals are subsequently pressure filtered, and the filter cake smelted to produce doré.

Sulphide Ore

Run-of-mine sulphide ore is delivered to the crusher dump pocket from the mine by 290 tonne rear-dump–haul trucks. The crushing circuit is designed to process up to 136,000 tonnes per day of run-of-mine sulphide ore to 80% passing 150 millimetres. The crushing facility initially consisted of a gyratory crusher capable of operating at 92% utilization on a 24-hour-per-day, 365-days-per-year basis.

For 2018, a total of 35,247,772 metric tonnes of ore was processed through the sulphide plant facility, for a total of 272,001 ounces of gold, 18,292,121 ounces of silver, 318,210,712 pounds of zinc, and 116,286,606 pounds of lead produced (payable metal). Metallurgical recoveries averaged 65.97% for gold, 78.84% for silver, 80.36% for zinc, and 69.99% for lead.

Pyrite Leach

A feasibility study for the PLP was completed during the fourth quarter of 2015. An investment decision on the PLP was approved in 2016, and the PLP was completed in the fourth quarter of 2018. The PLP is expected to increase overall gold and silver recovery by treating the zinc tailings before discharge to the tailings storage facility. The PLP is expected to add production of approximately 1 million ounces of gold and 44 million ounces of silver over the current LOM. As part of the PLP, a carbon pre-flotation facility has been constructed and began operation in the second quarter of 2018.

Markets/Contracts

We have an operative refining agreement with Met Mex Peñoles for refining of doré produced from the Peñasquito Mine. Our bullion is sold on the spot market by our marketing experts retained in-house. The terms contained within the sales contracts are typical and consistent with standard industry practice and are similar to contracts for the supply of doré elsewhere in the world. A portion of the silver production is forward-sold to Wheaton Precious Metals Corp. (25%) as part of the streaming arrangement.

The markets for the lead and zinc concentrates from the Peñasquito Mine are worldwide with smelters located in Mexico, Canada, United States, Asia and Europe. Metals prices are quoted for lead and zinc on the London Metals Exchange and for gold and silver by the London Bullion Market Association. The metal payable terms and smelter treatment and refining charges for both lead and zinc concentrate represent typical terms for the market and qualities produced by the Peñasquito Mine.

Infrastructure, Permitting and Compliance Activities

As of August 2015, the Peñasquito Mine uses power sourced from a subsidiary of InterGen Servicios Mexico who operates a 182 megawatt gas-fired combined cycle power plant. The annual power consumption ranges from 130–145 megawatts per day, with the majority (>85%) of the consumption in the processing facility.

Process and potable water for the Peñasquito Mine is sourced from the Torres-Vergel well field located six kilometres west of the Peñasquito Mine and an additional groundwater source within the Cedros basin named the Northern Well Field.

There is sufficient suitable land available within our mineral tenure for tailings disposal, mine waste disposal, and mining-related infrastructure, such as the open pit, process plant, workshops and offices. A skilled labour force is available in the region where the Peñasquito Mine is located and in the surrounding mining areas of Mexico. Accommodation comprises a 3,421-bed camp with full dining, laundry and recreational facilities. Fuel and supplies are sourced from nearby regional centres such as Monterrey, Monclova, Saltillo and Zacatecas and imports from the United States via Laredo.

Various baseline studies, with respect to water, air, noise, wildlife, forest resources and waste and materials have been completed. Environmental permits are required by various Mexican Federal, state and municipal agencies, and are in place for project operations. The initial project environmental impact assessment was authorized on December 18, 2006. This initial document was prepared based on a production rate of 50,000 tonnes per day. Additional impact assessments for extensions or modifications to increase permitted capacity to 150,000 tonnes per day have been filed and approved since 2008. Reviews of the environmental permitting, legal, title, taxation, socio-economic, marketing and political factors and constraints for the Peñasquito Mine support the declaration of Mineral Reserves.

Capital and Operating Costs

Capital cost estimates are based on the latest mine construction data and budgetary figures and quotes provided by suppliers. Capital cost estimates include funding for infrastructure, mobile equipment, development and permitting, and miscellaneous costs. Infrastructure requirements were incorporated into the estimates as needed. Sustaining capital costs reflect current price trends.

The PLP project received Board approval in 2016 and commenced construction. The data below is updated to LOM from 2018-2029.

Area	Life-of-Mine (\$ million)
Mine Pre-Stripping	\$818.30
General Sustaining	\$1,087.79
Growth	\$191.75
Total	\$2,097.84

Operating costs are based on the 2018 LOM budget. Labour cost estimation is based on our 2019 salary scale and fringe benefits in force. Mining consumables are based on 2018 costs and contracts and the costs for future operation consumables, such as mill reagents and grinding media are based on recent supplier quotations.

Area	Life-of-Mine (\$ per tonne)
Process Plant (with Pyrite Leach)	\$9.09 per tonne milled
Process Plant (without Pyrite Leach)	\$7.46 per tonne milled
G&A	\$1.88 per tonne milled
Mining	\$1.87 per tonne of material mined

Exploration, Development and Production

In 2019, exploration at the Peñasquito Mine will continue to focus on defining near pit Mineral Resources and selected regional targets. The skarn geological target below the current Peñasquito open pit is on hold and remains a lower priority within the list of local and regional targets. There are currently 29 regional targets identified from Geochemical and Geophysical works, these targets are being prioritised in order to further test and develop their potential.

At the Peñasquito Mine, gold production for 2019 is expected to be in the range of 370,000 to 400,000 ounces. See “Risk Factors – Our financial projections rely on estimates of future production and estimates of future production may vary, which could have a negative impact on our future cash flows, business, results of operations and financial condition”.

Pueblo Viejo Mine, Dominican Republic

We hold a 40% interest in the Pueblo Viejo Mine, an open pit gold mine located in the Dominican Republic. Barrick holds the other 60% interest in, and operates, the Pueblo Viejo Mine. The scientific and technical information included in the following section has been derived, in part, from the technical report entitled Technical Report on the Pueblo Viejo Project, Sanchez Ramirez province, Dominican Republic (the “**Pueblo Viejo Report**”) dated March 19, 2018, prepared by Rosmery Cardenas, P.Eng., Hugo Miranda, MBA, ChMC (RM), and Holger Krutzelmann, P.Eng., of Roscoe Postle Associates Inc., each of whom is a qualified person under NI 43-101.

Property Description, Location and Access

The Pueblo Viejo Mine is located in the central part of the Dominican Republic on the Caribbean island of Hispaniola in the province of Sanchez Ramirez. The Pueblo Viejo Mine is 15 kilometres west of the provincial capital of Cotui and approximately 100 kilometres northwest of the national capital of Santo Domingo. Access to the Pueblo Viejo Mine from Santo Domingo is by a four lane, paved highway, which then connects to a paved, two-lane, secondary highway at the town of Piedra Blanca, approximately 78 kilometres from Santo Domingo, the location of the main port facility.

Pueblo Viejo Dominicana Corporation (“**PVDC**”) is the holder of the right to lease the Montenegro Fiscal Reserve by virtue of a special lease agreement of mining rights, effective as of July 29, 2003, as amended in November 2009 and on October 5, 2013 (the “**Special Lease Agreement**”). The Special Lease Agreement provides PVDC with the right to operate for a 25-year period, which was triggered on February 26, 2008, with rights of renewal allowing for a total term of 75 years. Under the Special Lease Agreement, PVDC is obliged to pay to the government of the Dominican Republic: income tax; a net smelter return royalty; and a net profits interest.

The second amendment to the Special Lease Agreement, effective October 5, 2013, mainly covers changes to the special tax regime previously agreed in the Special Lease Agreement. The most notable modifications include: elimination of a 10% return embedded in the initial capital investment for the purposes of the net profits interest calculation; an extension to the period over which PVDC may recover its capital investment; a delay of application of net profits interest deductions; a reduction in tax depreciation rates; and establishment of a graduated minimum tax. The graduated tax minimum tax rate will be adjusted up or down based on future metal prices. The amended Special Lease Agreement also includes the following broad parameters consistent with the previous terms of the original agreement: corporate income tax rate of 25%; net smelter return royalty of 3.2%; and net profits interest of 28.75%. During 2017, PVDC and the Dominican Republic government reached an agreement on an updated financial model for the graduated minimum tax rates that will apply from 2017 through 2019.

PVDC holds all surface rights necessary to access and exploit the deposits. PVDC has acquired all of the permits necessary to operate the Pueblo Viejo Mine at the present time. In addition to the mine operations, by means of the second amendment to the Special Lease Agreement, the Dominican Republic government granted PVDC a power concession to generate electricity for consumption by the Pueblo Viejo Mine and the right to sell excess power. Also, in March 2012, PVDC obtained an environmental permit for the Quisqueya Power Plant and a power transmission line from San Pedro, where the power plant is situated, to the Pueblo Viejo Mine site.

The government of the Dominican Republic remains responsible for the relocation, where necessary, of those persons dwelling in the Los Cacaos basin. Pursuant to the Special Lease Agreement, environmental remediation within the mine site and its area of influence is the responsibility of PVDC, while the Dominican Republic government is responsible for historic impacts outside the development area and for the hazardous substances located at the Rosario Resources Corporation of New York (“**Rosario**”) plant site. However, agreement was reached in 2009 that PVDC would donate up to \$37.5 million, or half of the government's total estimated cost of \$75 million, for its clean-up responsibilities. In December 2010, PVDC agreed to contribute the remaining \$37.5 million on behalf of the government towards these clean-up activities.

History

The earliest records of Spanish mine workings at Pueblo Viejo are from 1505, although Spanish explorers sent into the interior of the island during the second visit of Columbus in 1495 probably found the deposit being actively mined by the native population. The Spanish mined the deposit until 1525, when the mine was abandoned in favour of newly discovered deposits on the American mainland. There are few records of activity at Pueblo Viejo from 1525 to 1950, when the Dominican government sponsored geological mapping in the region. Exploration at Pueblo Viejo focused on sulphide veins hosted in unoxidized sediments in stream bed outcrops.

Rosario optioned the property in 1969. As before, exploration was directed first at the unoxidized rock where sulphide veins outcropped in the stream valley and the oxide cap was only a few metres thick. As drilling moved out of the valley and on to higher ground, the thickness of the oxide cap increased to a maximum of 80 metres, revealing an oxide ore deposit of significant tonnage. In 1972, Rosario Dominicana S.A. was incorporated and, in 1975, open pit mining of the oxide deposits started in the Moore deposit. In 1979, the Dominican Republic Central Bank purchased all foreign-held shares in the mine. Rosario continued exploration throughout the 1970s and early 1980s, looking for additional oxide resources to extend the life of the mine.

The Monte Negro, Mejita, and Cumba deposits were identified by soil sampling and percussion drilling, and were put into production in the 1980s. With the oxide resources diminishing, Rosario initiated studies on the underlying refractory sulphide resource in an effort to continue the operation and in 1986 and 1992, feasibility studies were conducted.

Rosario continued to mine the oxide material until 1991, when the oxide resource was essentially exhausted. A carbon-in-leach plant circuit and new tailings facility at Las Lagunas were commissioned to process transitional sulphide ore at a maximum of 9,000 tonnes per day. Results were poor, with gold recoveries varying from 30% to 50%. Mining in the Moore deposit stopped early in the 1990s owing to high copper content (which resulted in high cyanide consumption) and ore hardness. Mining ceased in the Monte Negro deposit in 1998, and stockpile mining continued until July 1999, when the operation was shut down. In 24 years of production, the Pueblo Viejo Mine produced a total of 5.5 million ounces of gold and 25.2 million ounces of silver.

Three companies were involved in Rosario's attempt to find a strategic partner in 1992 and 1996: GENEL JV, Mount Isa Mines Ltd. ("**MIM**"), and Newmont. The process was never completed but each of the three companies conducted work on the property for their evaluations.

In 2000, the government of the Dominican Republic invited international bids for the leasing and mineral exploitation of the Pueblo Viejo sulphide deposits. Placer Dome Inc. ("**Placer Dome**") was the successful bidder and the parties negotiated the Special Lease Agreement, which became effective on July 29, 2003. Placer Dome conducted regional mapping, geotechnical assessment, environmental baseline studies and exploration drilling until February 2006, when Barrick acquired Placer Dome and subsequently sold us a 40% stake in the Pueblo Viejo Mine.

In August 2010, the open pit pre-stripping started. The total ore mined between 2010 and 2018 is 126.9 million tonnes. In 2018, the total ore processed was 8,346,527 tonnes which, based on our 40% interest, produced 388,000 gold ounces for Goldcorp.

Geological Setting, Mineralization and Deposit Types

The Pueblo Viejo Mine is hosted by the Lower Cretaceous Los Ranchos Formation, a series of volcanic and volcanoclastic rocks that extend across the eastern half of the Dominican Republic, generally striking northwest and dipping southwest. The Los Ranchos Formation consists of a lower complex of pillowed basalt, basaltic andesite flows, dacitic flows, tuffs, and intrusions, overlain by volcanoclastic sedimentary rocks, and interpreted to be a Lower Cretaceous intra-oceanic island arc, one of several bimodal volcanic piles that form the base of the Greater Antilles Caribbean islands. The unit has undergone extensive seawater metamorphism (spilitization), and lithologies have been referred to as spilite (basaltic-andesite) and keratophyre (dacite).

The Pueblo Viejo member of the Los Ranchos Formation is confined to a restricted, sedimentary basin measuring approximately three kilometres north to south by two kilometres east to west. The basin is filled with lacustrine deposits that range from coarse conglomerate deposited at the edge of the basin to thinly bedded carbonaceous sandstone, siltstone, and mudstone deposited further from the paleo-shoreline. In addition, there are pyroclastic rocks, dacitic domes, and diorite dikes within the basin. The Pueblo Viejo member is bounded to the east by volcanoclastic rocks, and to the north and west by Platanal Member basaltic-andesite (spilite) flows and dacitic domes. To the south, the Pueblo Viejo member is overthrust by the Hatillo Limestone Formation.

Pueblo Viejo is a high sulphidation, quartz-alunite epithermal gold and silver deposit. High sulphidation deposits are typically derived from fluids enriched in magmatic volatiles, which have migrated from a deep intrusive body to an epithermal crustal setting, with only limited dilution by groundwater or interaction with host rocks. Major dilatant structures or phreatomagmatic breccia pipes provide conduits for rapid fluid ascent and so facilitate evolution of the characteristic high sulphidation fluid. Mineralization is predominantly pyrite with lesser amounts of sphalerite and enargite. Pyrite mineralization occurs as disseminations, layers, replacements, and veins. Sphalerite and enargite mineralization is primarily in veins, but disseminated sphalerite has been noted in core.

The Pueblo Viejo deposits are classed as Cretaceous high sulphidation, epithermal gold, silver, copper and zinc deposits. They are characterized by veins, vuggy breccias and sulphide replacements ranging from pods to massive lenses, occurring generally in volcanic sequences and associated with high-level hydrothermal systems. Acid leaching, advanced argillic alteration, and silicification are characteristic alteration styles. Grade and tonnage varies widely. Pyrite, gold, electrum and enargite/luzonite are typical minerals and minor minerals include chalcopyrite, sphalerite, tetrahedrite/tennantite, galena, marcasite, arsenopyrite, silver sulphosalts, and tellurides.

There were three stages of advanced argillic alteration associated with precious metal mineralization. The third stage of mineralization occurred when hydro-fracturing of the silica cap produced pyrite-sphalerite-enargite veins with silicified haloes. Exposed at the surface, individual veins can be traced vertically over three pit benches (30 metres). Veins are typically concentrated in zones that are elongated north-northwest and can be 250 metres long, 100 metres wide and 100 metres vertical. Stage three veins contain the highest precious and base metal values and are more widely distributed in the upper portions of the deposits. The most common vein minerals are pyrite, sphalerite, and quartz with lesser amounts of enargite, barite, and pyrophyllite. Trace amounts of electrum, argentite, colusite, tetrahedrite-tennantite, geocronite, galena, siderite and tellurides are also found in veins.

Gold is intimately associated with pyrite veins, disseminations, replacements, and layers within the zones of advanced argillic alteration. Gold values generally are the highest in zones of silicification or strong quartz-pyrophyllite alteration. These gold-bearing alteration zones are widely distributed in the upper parts of the deposits and tend to funnel into narrow feeder zones. Gold occurs as native gold, sylvanite, and aurostibnite. The principal carrier of gold is pyrite where the sub-microscopic gold occurs in colloidal-size micro inclusions (less than 0.5 micrometres) and as a solid solution within the crystal structure of the pyrite. Silver content tends to correlate gold content and silver has a strong association with stage three veins, where it occurs in a variety of minerals.

Most copper occurs as enargite hosted in stage three veins and only trace amounts of chalcocite and chalcopyrite have been recorded. The majority of zinc occurs as sphalerite, primarily in stage three veins and, to a lesser extent, as disseminations. Lead minerals include galena, geocronite, boulangerite, and bournonite, most of which are present as fine inclusions or within fractures in pyrite, sphalerite, and enargite. Elevated lead values were found in the structural feeder zone in the Moore deposit and lead may provide clues on where to search for other feeder zones.

The Moore Deposit

Pyrite-rich, gold-bearing veins at the Moore deposit have a mean width of four centimetres and are steeply-dipping with a trend commonly north-northwest. Secondary pyrite vein-sets trend north-south and north-northeast.

Thinly bedded carbonaceous siltstones and andesitic sandstones in the West Flank dip shallowly westwards. Dips increase towards the west where north-trending thrusts displace bedding. Pyrite and limonite-rich veins with gold mineralization are sub-vertical and trend commonly north-northwest. Quartz veins with gold trend northwest oblique to the pyrite veins have a similar strike to the interpreted contact with the overlying Hatillo limestone. They also occur as tension-gash arrays in centimetre-scale dextral shear zones that trend north-northwest. Two main north-northeast faults were mapped across the West Flank, sub-parallel with the Moore dacite porphyry contact.

Bedding to the north of the Moore dacite porphyry dips shallowly westwards. There are three steep-dipping, gold-bearing, pyrite-rich vein sets: northwest, northeast and north south. Northwest trending veins generally contain enargite and sphalerite, while northeast trending veins are more pyrite \pm pyrophyllite rich. The average vein width is 3.5 centimetres.

The Monte Negro Deposit

Pyrite-rich veins with gold mineralization are sub-vertical and have bimodal trends, which are interpreted to form conjugate sets. The mean width is two centimetres. The north-northwest trending set is sub-parallel to the strike of bedding and fold axes. Enargite and sphalerite-bearing veins with gold dominantly trend north-northeast and have a mean width of three centimetres. The combination of vein trends forms a high-grade gold zone (Vein Zone One) which extends 500 metres north-northwest, and is 150 metres wide and up to 100 metres thick between the F5 Fault to the east and the Main Monte Negro Fault to the west. The fault pattern is dominated by steep north-northwest trending faults sub-parallel to the dominant pyrite vein set. The main Monte Negro Fault is a 25 metre by 500 metre zone of silicification, brecciation, mineralization, folding, and faulting.

Close to the interpreted Monte Negro Fault, bedding dips more westerly and strikes north-northwest. Mineralized veins at the Monte Negro South Zone are relatively pyrite-poor, sphalerite-rich, and wider (five centimetres to six centimetres). The veins are sub-vertical and trend northwest. The episodic vein fill demonstrates a clear paragenesis (massive pyrite-enargite-sphalerite-grey silica). Shallow-dipping bedding and sub-vertical sphalerite-silica veins on the southern margin of Monte Negro South are cut by a westerly-dipping thrust and the fault dips 35 degrees. The main zone of gold mineralization that results from this combination of structures extends for approximately 150 metres along the West Thrust Fault.

The primary controls on the geometry of the gold deposits at the Pueblo Viejo Mine are strong quartz-pyrophyllite alteration and quartz-pyrite veining along sub-vertical structures and stratigraphic zones. The veins are tens of centimetres wide but are most commonly less than two centimetres wide. Narrow veinlets occur along bedding planes and along fracture surfaces. These veins are commonly highly discordant to bedding but locally branch out along shallow-dipping bedding planes, linking high angle veins in ladder-like fashion without obvious preferred orientations. These veins served as feeders to the layered and disseminated mineralization that occurs in shallower levels in the deposit. The result is composite zones of mineralization within fracture systems and stratigraphic horizons adjacent to major faults that served as conduits for hydrothermal fluids. The outer boundary of advanced argillic alteration, combined with lithological and veining zones were used to generate domains for Mineral Resource estimation.

Monte Negro 10 Deposit

Monte Negro 10, formerly Monte Oculito deposit, is part of the Monte Negro mineralization and is located at its northeast margin. Mineralization is hosted in andesitic flows, is controlled by a north-northwest structural trend, and associated with quartz-dickite-pyrophyllite hydrothermal alteration.

Cumba Deposit

The Cumba deposit is located to the east of the Monte Negro deposit. Mineralization is hosted in andesitic flows, is controlled by an east-west structural trend, and associated with quartz-dickite-pyrophyllite hydrothermal alteration.

Upper Mejita Deposit

The Upper Mejita deposit is located on the east side of the Moore deposit. Mineralization is hosted in carbonaceous sediments, dacitic tuffs and andesitic flows, is controlled by east-west and north-south structural trends, and is associated with quartz-dickite-pyrophyllite hydrothermal alteration.

Exploration

During 2018, eight exploration programs were undertaken at Pueblo Viejo consisting of a combination of reverse circulation drilling and diamond drilling totaling 22,204 metres at Cumba, Upper Mejita, Moore North, ARD1, Arroyo Hondo, MN West Deep, Mo West Deep and PV Underground target. In 2019, exploration plans include reverse circulation and diamond drilling over eight targets. There will be four areas of primary exploration: Monte Negro X, Monte Negro phase X East, Mejita Deep and Arroyo Hondo. There will also be advanced exploration occurring at four targets previously drilled targets: Upper Mejita, Moore North, ARD1 and Cumba NW.

In 2019, exploration plans include reverse circulation and diamond drilling over seven targets. There will be three areas of primary exploration: Monte Negro X, Arroyo Hondo and Mejita Deep. There will also be advanced exploration occurring on previously drilled targets: Upper Mejita, ARD1, Cumba NW and PV Deeper.

Drilling

As of December 31, 2018, the drill hole database used to support the development of Mineral Resources for the Pueblo Viejo property contains 2,613 drill holes, comprised of 890 diamond drill core holes, 525 reverse circulation, and 1,198 percussion holes and rotary samples. Samples totaling 88,359 metres from diamond drill holes, 30,151 metres from rotary and percussion holes and 33,762 metres from reverse circulation have been collected. In addition, 13,890 close-spaced reverse circulation grade control drill holes, totaling 571,279 metres were used to estimate the gold, silver, and copper resources. The drill hole spacing is variable, ranging from 10 to 15 metres.

In 2018, the Pueblo Viejo Mine exploration drilling campaign included 98 reverse circulation and diamond drill holes totalling 22,204 metres in the Cumba, Upper Mejita, Moore North, ARD1, Arroyo Hondo, MN West Deep, MO West Deep and PV Underground projects. Reserve definition drilling totalled 87 holes for 14,624 metres. The reverse circulation grade control drilling totalled 270 holes for 12,976 metres in the Monte Negro pit; 1,413 holes for 71,074 metres in the Moore pit and 66 holes for 3,930 metres in the Cumba pit.

Drill pads are located using GPS or surface plans where the GPS signal is weak. After completion, the drill hole locations are surveyed in Universal Transverse Mercator coordinates by a professional surveyor, translated into the mine coordinate system, and entered into the drill hole database. Two or three down-hole surveys are completed in all drill holes. Surveys are spaced every 60 metres to 75 metres, and deviation of the drill holes is minimal.

Geotechnical and water management drilling at the Pueblo Viejo Mine was completed from 2001 to 2010 by BGC Engineering Inc. ("**BGC**"), an international consulting firm specializing in geotechnical and water resources engineering. Water Management Consulting ("**WMC**") drilled some drill holes in 2003 and 2004. The BGC and WMC holes from 2001 to 2010 are mostly short holes and have been excluded from the Mineral Resource estimate because they were not assayed.

Sampling, Analysis and Data Verification

Sample intervals are normally two metres, but are shortened at lithological, structural, or major alteration contacts. Three metre samples are used in non-mineralized zones. Core logging is performed by geological technicians and includes photographic records and appropriate record keeping, and the core is cut into halves using a core saw prior to sampling. The entire second half of the core is kept for records and future metallurgical test work, and the other half is placed in sample bags and numbered. Since mid-

2010, sub-samples are prepared on-site and the pulverized samples are sent to Acme in Santiago and ALS Chemex in Peru.

PVDC currently requests gold assays by fire assay with atomic absorption on 30 gram aliquots and gravimetric finishes for all assays exceeding ten g/t of gold. Silver and zinc values are analyzed using aqua regia digestion method and atomic absorption finish. A 35-element inductively coupled plasma atomic emission spectroscopy analysis is done on all samples. Sulphur and carbon are assayed by LECO furnace. The PVDC laboratory does periodic sieve checks as part of its internal quality control procedures. The reverse circulation grade control samples were mostly sent to ALS Chemex in Lima up until early 2013, when the Pueblo Viejo Mine began assaying the samples directly at the PVDC laboratory. The main difference is that the PVDC laboratory uses a 15 gram aliquot compared to 30 gram at ALS Chemex.

The QA/QC procedures in place consist of the introduction of blanks, standards (commercial and custom), core duplicates, coarse duplicates and cleaning blanks into the sampling process. Each batch is submitted with 76 samples, of which two are blanks, two to three are standards, two are core duplicates, two are coarse duplicates, and seven are cleaning blanks. The PVDC geology department currently inserts three certified reference materials, three field duplicates, and two blanks into each batch of 60 samples. This is in addition to two percent of cross checks in pulp duplicates. Consequently, 15% of the samples in each batch of 60 samples are quality control samples.

Since August 1, 2007, PVDC has been sending approximately 5% of the pulps to a secondary laboratory. The ACME on-site preparation facility carried out regular granulometric control tests on approximately three percent of the crushed and pulverized material. The results were monitored by Acme and PVDC personnel. The PVDC laboratory has continued this practice and these results are included in monthly QA/QC reports. Monitoring is undertaken on a batch by batch basis. Any check results that fall outside the established control limited is re-assayed if the cause is not the result of a sample number switch.

Barrick reviewed assays for MIM, GENEL JV, Rosario and Placer Dome drilling in both the Moore and Monte Negro deposits. In general, it found reasonable agreement of the orientation, tenor, and thickness of mineralization between drilling campaigns in both deposits where MIM, GENEL JV, Rosario, and Placer Dome drill holes cross. Histograms of the historical drilling campaigns show that the diamond core drilling from all campaigns except PVDC compare well with the global distribution.

The PVDC drilling was targeted at the periphery of the existing mineralization so that overall lower grades would be expected. The reverse circulation and rotary drilling also compare well, with the exception of the Placer Dome rotary holes which are biased high and were possibly preferentially drilled in shallow high grade areas to better delineate early production. The information from these holes should have been removed from the database, but this does not constitute a material issue. Approximately 2.5% of the Rosario data have been verified against original documents. The Rosario core, reverse circulation and some rotary data are generally reliable and those that are considered to be of questionable validity have not been used in resource estimates.

As noted earlier, most of the shallow Rosario drill holes were drilled in oxide areas now mined out and have virtually no influence on sulphide Mineral Resource estimates. GENEL JV and Placer Dome data have been verified and are considered reliable. MIM data has not been verified against original documents and there is some risk involved with using that data. On the basis of comparisons between mineralized intersections in MIM holes and those in nearby Placer Dome holes, the risk of using the MIM data is considered to be acceptable. Placer Dome data has been verified against original documents and is considered to be reliable.

Drilling data is acceptable for the purpose of overall Mineral Resource and Mineral Reserve estimation and economic assessments. Some of the data may result in minor inaccuracies in local estimates.

Prior to making geotechnical measurements, the entire core interval is removed from the core box and placed in a long trough made of angle-iron. The fractures in the core are lined up, and artificial fractures are identified. This process allows the technician to mark the orienting line on the core for a better estimate of core recovery. The core is cut in half and the entire second half of core is kept for records and

future metallurgical test work. The archived half of the core is stored on site for future reference in suitable storage conditions. The sampled half is placed in plastic sample bags marked with the appropriate sample number and sealed with a numbered security tag. Since mid-2010, PVDC has been preparing the sub-samples on-site and sending the pulverized samples to commercial laboratories. The reverse circulation grade control samples were mostly sent to ALS Chemex in Lima up until early 2013 when the mine began assaying the samples directly at the PVDC laboratory. We consider sample security to be adequate and to meet industry standards.

Mineral Processing and Metallurgical Testing

The Pueblo Viejo ore is refractory and consists primarily of gold and silver intimately associated with pyrite that occurs as encapsulated sub-micron particles and in solid solution. As a result, there is a requirement to chemically break down the pyrite to recover the precious metals. In addition, there are cyanide consuming minerals and preg-robbing carbonaceous material in some ores. Pyrite and sphalerite are the two main sulphide minerals, both occurring in veins and disseminated within the host rock. Using lithological and mineralization criteria, five metallurgical ore types have been defined, including two for the Moore deposit and three for the Monte Negro deposit. The main criterion used to define metallurgical domains is carbon content, i.e., separating carbonaceous rocks from lower carbon-content rocks in each deposit.

Pressure oxidation of the whole ore followed by carbon-in-leach cyanidation of the autoclave product is expected to recover 88.7% of the gold and 77.0% of the silver. The efficient and trouble-free operation of the pressure oxidization circuit relies heavily on maintaining relatively constant sulphur content in the autoclave feed. Studies showed that there are wide variations in the sulphur content of the ore as the blocks are mined sequentially. The variation in sulphur grade ranges from 3% to 20% sulphur and generally between 5% and 10%. Blending of ores may be carried out prior to crushing or it may occur as a result of the mining sequence in the case of direct feed ore.

Mineral Reserve and Mineral Resource Estimate

The following table sets forth the Mineral Reserve estimation for our 40% interest in the Pueblo Viejo Mine effective December 31, 2018:

Proven and Probable Mineral Reserves ⁽¹⁾⁽²⁾⁽³⁾⁽⁴⁾⁽⁵⁾⁽⁶⁾

Category	Tonnes (millions)	Grade		Contained Metal	
		Gold (grams per tonne)	Silver (grams per tonne)	Gold (millions of ounces)	Silver (millions of ounces)
Proven	41.09	2.56	17.59	3.38	23.24
Probable	10.07	3.05	14.81	0.99	4.80
Proven + Probable	51.16	2.66	17.04	4.37	28.03

Notes:

- (1) The Mineral Reserves for Pueblo Viejo Mine set out in the table above have been reviewed and approved by Patrick Garretson, SME Registered Member, Director, Resources and Reserves at Goldcorp, a qualified person under NI 43-101. The Mineral Reserves are classified as Proven and Probable, and are based on the CIM Definition Standards.
- (2) No cut-off grade is applied. Instead, the profit of each block in the Mineral Resource is calculated and included in the Mineral Reserve if the value is positive.
- (3) Mineral Reserves are estimated using a long-term price of \$1,200 per ounce of gold and \$16.50 per ounce of silver.
- (4) 100% mining recovery and no dilution.
- (5) Average metallurgical recovery is 88.7% for gold, 80.0% for silver and 47.5% for copper.
- (6) Numbers may not add up due to rounding.
- (7) We are not aware of any environmental, permitting, legal, title, taxation, socio-economic, marketing, political or other modifying factors that could materially affect the Mineral Reserve estimate.

The following table sets forth the gold, silver and copper Mineral Resource estimations for our 40% interest in the Pueblo Viejo Mine effective December 31, 2018:

Measured, Indicated and Inferred Gold and Silver Mineral Resources ⁽¹⁾⁽²⁾⁽³⁾⁽⁴⁾⁽⁵⁾⁽⁶⁾⁽⁷⁾⁽⁸⁾
(excluding Proven and Probable Mineral Reserves)

Category	Tonnes (millions)	Grade		Contained Metal	
		Gold (grams per tonne)	Silver (grams per tonne)	Gold (millions of ounces)	Silver (millions of ounces)
Measured	5.08	2.39	14.28	0.39	2.33
Indicated	62.49	2.47	13.60	4.96	27.32
Measured + Indicated	67.57	2.46	13.65	5.35	29.65
Inferred	18.40	2.43	10.80	1.43	6.39

Notes:

- (1) The Mineral Resources for Pueblo Viejo Mine set out in the table above have been reviewed and approved by Patrick Garretson, SME Registered Member, Director, Resources and Reserves at Goldcorp, who is a qualified person under NI 43-101. The Mineral Resources are classified as Measured, Indicated and Inferred, and are based on the CIM Definition Standards.
- (2) Mineral Resources are estimated based on an economic cut-off value.
- (3) Mineral Resources are estimated using a long-term price of \$1,500 per ounce of gold and \$20.50 per ounce of silver.
- (4) A minimum mining width (block size) of five metres was used.
- (5) All Mineral Resources are reported exclusive of those Mineral Resources that were converted to Mineral Reserves. Mineral Resources do not have demonstrated economic viability.
- (6) Mineral Resource contained in reserve pit excluded due to tailings storage facility capacity constraint.
- (7) Numbers may not add due to rounding.
- (8) We are not aware of any environmental, permitting, legal, title, taxation, socio-economic, marketing, political or other modifying factors that could materially affect the Mineral Resource estimate.

Processing and Recovery Operations

The Pueblo Viejo Mine consists of two open pits: Moore and Monte Negro. Mining operations are undertaken by a conventional truck and shovel method. Mine development began in August 2010 and current mine activity is in the Monte Negro and Moore pits. Commercial production began in January 2013 and the ramp-up to commercial production was achieved on January 1, 2014. Higher grade ore is processed in the early years, while lower grade ore is stockpiled for later processing in order to maximize project economics. The ore stockpiles are classified as high grade, medium grade and low grade material. As at December 31, 2018, the total ore on stockpile was 83.81 million tonnes and is expected to reach the maximum of approximately 103.6 million tonnes by 2021.

The pit stages have been designed to optimize the early extraction of the higher grade ore. Notwithstanding, the driver of the mine schedule is the sulphur blending requirement. Sulphur grade is as important as the gold grade, because the metallurgical aspects of the processing operation, the recoveries achieved, and the processing costs, all strongly depend on a very consistent, low-variability sulphur content in the plant feed. The combination of direct feed and stockpile re-handle is the current short term blending strategy of the Pueblo Viejo Mine.

Potentially acid generating waste rock from the Moore and Monte Negro pits is hauled to the El Llagal tailings area, and is submerged in the tailings facility. The total storage capacity of the tailings storage facility is for 279 million cubic metres of waste material (waste volume). The methodology used by PVDC for pit limit determination, cut-off grade optimization, production sequencing and scheduling, and estimation of equipment/manpower requirements is in line with standard industry practices.

The processing method requires a significant amount of slurry and lime derived from high quality limestone. The limestone tonnage required, with acceptable quality, has been located in the vicinity of the Pueblo Viejo Mine. Ground limestone and lime are required to neutralize acidic liquors and to control the pH in the carbon in leach circuit. The limestone plant consists of primary crushing and screening, grinding, calcining, and lime slaking.

The ore processing rate and the nominal plant capacity is set at 24,000 tonnes per day of refractory ore. It consists of the following unit operations: primary crushing; semi-autogenous grinding and ball mill grinding with pebble crushing; pressure oxidization; hot curing; counter-current-decantation washing; iron

precipitation; copper sulphide precipitation and recovery; neutralization; solution cooling; lime boiling for silver enhancement; carbon-in-leach circuit; carbon acid washing, stripping and regeneration; electrowinning; refining; cyanide destruction; tailings disposal; tailings effluent and acid rock drainage treatment; and limestone crushing, calcining and lime staking. The processing rate is flexible based on the sulphur content of the ore and will not always achieve 24,000 tonnes per day since the average sulphur grade of the reserves varies.

Gold, silver, and copper are the principal commodities at the Pueblo Viejo Mine and are freely traded at prices that are widely known, so prospects for sale of any production are virtually assured. The Pueblo Viejo Mine is a large modern operation and Barrick and Goldcorp are major international firms with policies and procedures for the letting of contracts. The contracts for smelting and refining are normal contracts for a large producer. There are numerous contracts at the mine including project development contracts to provide services to augment Barrick's efforts.

Contained copper has been removed from the Pueblo Viejo Mine's Mineral Reserves and Mineral Resources as at December 31, 2018 following a decision to suspend marginally economic copper production at the mine. The change is not reasonably expected to have any material impact on the Pueblo Viejo Mine's cash flows.

Infrastructure, Permitting and Compliance Activities

The tailings storage facility is operating in the El Llagal valley approximately four kilometres south of the plant site and the progressive raising of a large rock-filled dam with an impermeable saprolite core is underway. The tailings storage area will contain all of the process tailings, waste rock and high density sludge precipitate to be generated over the life of the Pueblo Viejo Mine, and runoff water from the design flood event. Additional tailings impoundment capacity will be studied and implemented as required by the resource base, as described in further detail below. In addition to solids storage, each cell in the tailings facility is sized to provide storage for an operating pond and for extreme precipitation events. The Pueblo Viejo Mine is situated in a seismically active area. The design of the dams at site was based on the maximum credible earthquake.

Scoping studies and pilot project work are supportive of a plant expansion at the Pueblo Viejo Mine that could reasonably be expected to increase throughput by roughly 50% to 12 million tonnes per year, allowing the mine to maintain average annual gold production of approximately 800,000 ounces after 2022 (100% basis). To achieve this, the mine is evaluating a flotation concentrator followed by ultra-fine grinding and tank oxidation of the concentrate. Testing to date has indicated that tank oxidation is preferable to the pad pre-oxidation process previously considered. Prefeasibility studies for the plant expansion and additional tailings capacity at the Pueblo Viejo Mine are expected to be completed by the end of 2019. The project has the potential to convert roughly seven million ounces of Measured and Indicated Mineral Resources to Proven and Probable Mineral Reserves (100% basis).

The Pueblo Viejo Mine is supplied electric power from two sources via two independent 230 kilovolt transmission circuits. A 218 megawatt Wartsila combined cycle reciprocating engine power plant together with an approximately 140 kilometre transmission line connects the plant to the Pueblo Viejo Mine. The power plant is located near the port city of San Pedro de Macoris on the south coast and will provide the long-term power supply for the Pueblo Viejo Mine. The plant is dual fuel and is currently operated on heavy fuel oil ("HFO") with the capability to convert to natural gas in the future if a supply becomes feasible. The HFO is delivered at an existing HFO off-loading facility in the harbor at San Pedro and transported to the plant by an 8 kilometre fuel pipeline.

The Hatillo and Hondo Reservoirs supply fresh water to the site. Reclaimed water from tailing storage facilities is used as a supplementary water supply under drought and flood situations. The potable water is a treated system. Reclaimed water from the tailings storage facility sites is used as a supplementary water supply under drought and flood situations. Barge-mounted pumps at the larger Hatillo Reservoir pump fresh water to the Hondo Reservoir for make-up purposes. Fresh water is then pumped to a fresh water/fire water tank at the 400 metre level and a freshwater pond, and from there it is distributed throughout the site for process, fire protection, and potable needs.

Mine development is designed to treat the majority of surface water that has been impacted by historical mining activity, and to control water quality during mine operation and post closure so that the water released to the receiving environment will meet water quality standards established by the Dominican Republic government and the World Bank. The process treated water is discharged to the Margajita River.

Acid rock drainage studies confirmed that historic mining and current acid rock drainage generation within the mine site had severely impacted the surrounding area. EnviroGold Limited is developing an operation for re-treating Las Lagunas tailings. PVDC also built a water treatment plant larger than would otherwise be required for mining operations. In addition, the Dominican Republic is required under the Special Lease Agreement, in compliance with the applicable Environmental and Social Guidelines and Policies, and at its sole cost and expense, to relocate and pay all indemnification and other compensation due to certain persons with valid claims to land within the Monte Negro Fiscal Reserve. Under the Special Lease Agreement, PVDC and the Dominican Republic, respectively, were required to come into compliance with the historic environmental mitigation and remediation matters for which they are responsible under that agreement by November 2014. PVDC achieved compliance by the deadline. In the second half of 2016, PVDC was contracted to act as an agent of the Dominican Republic government to carry out activities for which the Dominican Republic government is responsible under the Special Lease Agreement pursuant to the Environmental Management Plan of the State (Plan de Administración del Estado). The requisite environmental permits were received in November 2016 to carry out the first stage of the closure plan, which will focus on dewatering, buttressing, and improving the stability of the old Mejita tailings facility. Dewatering of the old Mejita tailings facility commenced in 2017 and a geotechnical investigation was completed. Construction activities for the buttress are planned to commence in the first quarter of 2019.

PVDC plans to progressively reclaim the mine site as sections of the site become available. The design of the mine closure plan considers a number of interrelated components. Among these are legal and other obligations, closure objectives, environmental and social considerations, technical design criteria, closure assumptions, health and safety hazards, and relinquishment conditions. The overall, long term post-closure land use objective for the site is to return it to a self-sustaining condition suitable to support pre-mining land use activities such as small-scale agriculture, hunting, and artisanal forestry.

In 2005, as updated in 2007, PVDC completed a feasibility study on the Pueblo Viejo Mine. An environmental and social impact assessment (“**ESIA**”) and environmental management plan (“**EMP**”) were approved by the Secretariat of State for the Environment and Natural Resources on December 26, **2006** and the environmental licence No. 0101-06 was issued in January 2007 (the “**Environmental Licence**”). Conditions of the Environmental License include detailed designs for tailings dams, installation of monitoring stations and submission for review of the waste management plan and incineration plant design. Other changes have been submitted to the authorities for additional facilities. The last amendment to the Environmental License was issued on June 29, 2017, which authorized the construction of an emulsion plant.

The Environmental Licence requires a compliance bond that corresponds to 10% of the cost of the Environmental Adjustment and Management Plan (“**PMAA**”) defined for the operational phase. At the end of the operational phase, PVDC will provide the corresponding bond at 10% of the total amount of the PMAA for the closure and post closure phases.

Capital and Operating Costs

Total sustaining capital and operating costs for the major categories over the LOM are extracted from the Pueblo Viejo Report.

The processing capital cost estimate of \$351.1 million includes infrastructure and TSF construction as the main expenses from 2014 to 2035. The G&A capital cost includes environmental and power capital costs over the LOM. Mine pre-stripping costs have been treated as an operating cost, and mine site exploration capital has been excluded as that capital should be expended against future Mineral Resources.

Area	Life-of-Mine (\$ million)
Open Pit	\$161.0
Processing	\$351.1
G&A	\$935.2
Total	\$1,447.4

An average overall operating cost over the LOM is comprised of \$2.93 per tonne for mining ore, \$3.31 per tonne for mining waste, \$1.97 per tonne processed for rehandle, \$39.45 per tonne for processing, \$0.58 per tonne processed for dewatering and an annual cost of \$78.9 million for G&A.

Area	Life-of-Mine (\$ per tonne)
Mining Cost Ore	\$2.93 per tonne mined
Mining Cost Waste	\$3.31 per tonne mined
Mining Cost Rehandle	\$1.97 per tonne milled
Process Cost	\$39.45 per tonne milled
Dewatering	\$0.58 per tonne milled

Exploration, Development and Production

In 2019, the Pueblo Viejo Mine expansion team is evaluating a flotation concentrator followed by ultra-fine grinding and tank oxidation of the concentrate. Testing to date has indicated that tank oxidation is preferable to the pad pre-oxidation process previously considered. Pueblo Viejo expects to complete prefeasibility studies for the plant expansion and additional tailings capacity by the end of 2019.

At the Pueblo Viejo Mine, our portion (40%) of gold production for 2019 is expected to be in the range of 380,000 to 400,000 ounces. See "Risk Factors – Our financial projections rely on estimates of future production and estimates of future production may not be reliable, which could have a negative impact on our future cash flows, business, results of operations and financial condition".

Cerro Negro Mine, Argentina

The Cerro Negro Mine, wholly-owned by Goldcorp, is an underground operation located in southern Argentina. The scientific and technical information included in the following section has been derived, in part, from the technical report entitled Cerro Negro Operations, Santa Cruz Province, Argentina, NI 43-101 Technical Report dated effective December 31, 2015 (the "**Cerro Negro Report**"), prepared by Andrew Tripp, P.E., Dr. Sally Goodman, P.Geo., Dr. Guillermo Pareja, P.Geo., and Kevin Murray, P.Eng., each of whom is a qualified person under NI 43-101.

Project Description, Location and Access

The Cerro Negro Mine is located about 345 kilometres by road southwest of the coastal city of Comodoro Rivadavia. Vehicle access to the property is from the coastal city of Comodoro Rivadavia, which is a 2.5 hour flight south of Buenos Aires. From Comodoro Rivadavia, road vehicle access to the mine takes approximately six hours. Road vehicle access is also possible from the west side of the mine from the town of Perito Moreno, about a 1.5 hour drive. The commercial airport at Balmaceda, Chile is about a five-hour drive to the west of the mine. Within the mine, a network of internal gravel roads services the various complexes, plant and exploration sites.

The mineral tenure consists of 10 mining leases (minas) totalling 21,548 hectares, and three exploration licences (cateos), covering 5,338.8 hectares. Tenure is held in the name of Oroplata SA ("**Oroplata**"), our wholly-owned Subsidiary. Tenure for minas is indefinite, providing that annual payments are made in February and July each year. A thin, 20 metre wide by 3 kilometre long gap currently exists internal to the

tenements and we have initiated the process required to eliminate the gap. The tenements lie on parts of five estancias (farms), respectively Cerro Negro, El Retiro, La Unión, Mariana and Los Tordos. We have access and occupation agreements in force with the owners of La Unión, Los Tordos, Cerro Negro, and El Retiro estancias; these agreements allow us access to ground that we do not control and allow exploration activities to be conducted. We also own significant lands in the Cerro Negro Mine area, totalling approximately 11,100 hectares, which lands overlie the Bajo Negro and Vein Zone deposits and adjacent prospects.

A 3% royalty is payable to the Province of Santa Cruz, subject to certain adjustments. In addition, there is a Provincial Sustainability Fund royalty of up to 2% of gross income, and a Municipality Sustainability Fund royalty of 1% of net earnings, which was amended for years 2018-2020 to reflect payments of approximately \$8 thousand per day of the mine's continuous operation, with a minimum of approximately \$1.2 million annually.

The Cerro Negro Mine operations hold all required permits to support the current mining operations.

History

Gold mineralization was first recognized in the Cerro Negro Mine area in 1992. Minera Newcrest Argentina S.A. ("**Newcrest**") undertook a reconnaissance exploration program over the Deseado Massif region in 1993, which identified mineralization at the Eureka, Mariana, El Retiro, Las Margaritas and Vein Zone areas. Newcrest picked up an option over the Silica Cap prospect tenement and applied for additional ground to cover the identified gold anomalous areas.

Newcrest completed geological mapping and sampling in 1995, which identified significant mineralization and identified several anomalous zones. Pegasus Gold International Inc. ("**Pegasus**") joint-ventured the Eureka-Mariana portion of the Newcrest tenure in 1996, and undertook reverse circulation drilling and conducted trenching at the San Marcos prospect. Due to non-maintenance and Newcrest dropping its option on the Silica Cap claim, the resulting open ground was staked by MIM Argentina Exploraciones ("**MAE**") in June 1995.

In 1997, Newcrest and MAE entered a joint venture and completed geological mapping at the Eureka, Las Margaritas, and Mariana Sur prospects; a soil geochemistry orientation study and mobile metal ion soil geochemistry survey; portable infrared mineral analyzer analysis of clay alteration minerals in samples from reverse circulation holes; preliminary metallurgical studies; trenching; ground magnetics and dipole-dipole induced polarization geophysical surveys; an airborne radiometric and aeromagnetic geophysical survey; and exploration drilling. Newcrest withdrew from the joint venture in early 1999, and MAE gained 100% control of the Cerro Negro Mine.

Oroplata optioned the Cerro Negro Mine from MAE in 2000. Work completed from 2000 to 2003 consisted of evaluation and ground checking of Landsat and ASTER spectral anomalies, reconnaissance mapping and sampling, and reverse circulation drilling.

In December 2003, Andean Resources Limited ("**Andean**") entered into an agreement with MAE to acquire a 51% interest in the Cerro Negro Mine, and subsequently acquired a 100% interest through the acquisition of Oroplata Pty Ltd., the parent entity of Oroplata. Andean undertook data validation, geological mapping, reconnaissance rock chip sampling, backhoe trenching, gradient-array resistivity, dipole-dipole resistivity, gradient-array chargeability, and ground magnetic surveys, petrographic and mineralogical descriptions, and exploration drilling. Mineral Resource estimates were undertaken in each year from 2005 to 2010. A pre-feasibility study was completed in 2008, and a feasibility study was completed in 2010.

Since our acquisition of the Cerro Negro Mine in December 2010, we have completed further drilling, which identified significant additional mineralization at the Mariana Central, Mariana Norte, San Marcos deposits and their extensions, an updated feasibility study in 2011 and completed mine construction. The Cerro Negro Mine achieved commercial production on January 1, 2015.

Continued exploration activities since the Cerro Negro Mine's startup have yielded numerous new discoveries and reserve additions at Mariana Norte Este B, Silica Cap, and Gato Salvaje.

Geological Setting, Mineralization and Deposit Types

The Cerro Negro gold-silver veins are located near the northwestern margin of the Deseado Massif, a 65,000 square kilometre rigid crustal block in southern Argentina bounded to the north by the Río Deseado, to the south by the Río Chico, to the east by the Atlantic coast, and to the west by the Andean Cordillera.

A late Triassic to late Cretaceous (230–65 Ma) extensional phase, linked to the opening of the South Atlantic Ocean, triggered extensive Mesozoic and Cenozoic magmatism throughout the massif. Magmatic activity commenced in the early Jurassic, with the intrusion of granitoids and eruption of coeval pyroclastic and epiclastic volcanic rocks. Andesitic to rhyolitic volcanism continued through the mid- to late Jurassic, culminating in the deposition of epiclastic sediments in the early Cretaceous.

Basaltic volcanism commenced in the Cretaceous and continued throughout the Cenozoic; volcanoclastic sediments were deposited and tuffs were erupted in the early Tertiary. These units are overlain by extensive Pleistocene fluvial gravel terraces.

Deposits within the Cerro Negro Mine operations are low-sulphidation, epithermal gold–silver vein deposits. The known deposits and prospects at Cerro Negro are distributed along and east of a volcanic–subvolcanic complex flanked and overlain by a series of rhyolite domes. The eruptive products of the rhyolite domes form an ignimbrite apron, which post-dates the mineralization and forms extensive outcrops north and south of the volcanic–subvolcanic complex. These post-mineralization ignimbrites have preserved the epithermal systems, as well as lacustrine sediments, travertine and sinter deposited at the Late Jurassic paleo-surface.

Vein mineralogy depends on the location of veins relative to the Eureka Volcanic-Subvolcanic Complex. Veins within the Complex (Eureka, San Marcos and the Marianas) contain higher silver and gold grades, and the Eureka veins contain abundant adularia and ginguero-style banding. Veins outside the dome and hosted by the Cerro Negro Ignimbrite (Silica Cap, Gato Salvaje, Bajo Negro and Vein Zone) contain lower silver grades, coarse pyrite rather than fine sulphides in ginguero bands, and a higher percentage of chalcedony and less adularia and carbonate in the gangue.

Vein textures typical of low-sulphidation epithermal systems include colloform and crustiform banding, cockade, and manganese/iron-oxide matrix breccias. At deeper levels, alternating colloform bands of quartz and adularia are developed, and bonanza gold-silver grades may be associated with dark, fine-grained ginguero sulphide bands.

Exploration

Exploration has been performed by a number of companies, including Newcrest, Pegasus, MAE, Oroplata and Andean. We acquired 100% of the Cerro Negro project in December 2010 in connection our acquisition of Andean.

Work completed includes geological mapping, surface rock sampling, geophysical studies, biogeochemical studies, reverse circulation and core drilling, geotechnical studies, hydrogeological studies, metallurgical testwork, Mineral Resource and Mineral Reserve estimation, and engineering and design studies. Andean completed a preliminary assessment, a pre-feasibility study, and a feasibility study on the project.

Drilling

Surface drilling completed in the Cerro Negro Operations area to December 31, 2018 comprises 405 reverse circulation drill holes, 290 combined RC/DDH drill holes and 2,407 core holes (approximately 118,900 metres of RC and 830,300 metres of DDH). Drilling was undertaken by Pegasus, MAE, Oroplata, Andean and Goldcorp, with the majority of the drilling being by Andean and Goldcorp.

No information is available on the Pegasus logging protocols; however, logged geological information has been spot checked where possible and those data are used for geological modeling. For the MAE drilling, core was logged, photographed, and cut on site. During the Oroplata drill programs, chips were logged at the completion of each hole with results recorded in the field on handwritten log sheets and later transferred to a computer format. Prior to the use of geological logging software, core was logged initially on log sheets designed by Andean personnel. In about 2008, DH Logger (a Datamine product) was implemented and used for digital logging of core. Logging data were entered directly into DH Logger. In addition, geotechnical logging was performed. Core recovery and rock quality designation data are routinely collected. All drill core from the Andean programs has been photographed. We continue to utilize DH Logger and logs the same geological features as were logged by Andean.

Collar locations of holes drilled by prior operators were determined by a licensed surveyor using differential GPS instruments. Contracted surveyors have been used from time to time. From 2009 to 2010, the surveyor was an employee of Andean and reported collar locations to the nearest millimetre using a differential GPS unit. Since 2011, surface collar locations and other surface features were determined by our employees using differential GPS. Various Trimble instruments were used. Underground surveys are performed using total station instruments. Some collars are manually measured from points set using total station instruments.

No downhole surveys are available for the Pegasus drilling. Surveys for the MAE and Oroplata drilling were provided in a database, but have no supporting documentation. Andean completed downhole surveys using an Eastman camera for holes drilled up to July 2007, a Reflex system tool for drill holes drilled between July 2007 and September 2008, and a gyroscopic system for holes drilled in 2009 and 2010. We perform downhole surveys of exploration holes with a Reflex Gyro on 10 metre intervals. Infill drilling from underground stations are surveyed using either a Reflex Gyro or a Reflex EZ-TRAC on 3 metre intervals.

Overall, recovery for core samples averaged 93% with 80% of the intervals reporting >95% recovery. Recovery in the veins frequently suffers because of the intense fracturing in the core. Review of the data indicates that there is likely no significant grade/recovery relationship for recoveries $\geq 30\%$.

Pegasus and Oroplata reverse circulation drill holes were sampled every metre. During the MAE programs, sampling was carried out every two metres. All reverse circulation holes drilled by Andean have been sampled every metre, with the exception of the first hole drilled at Vein Zone which was sampled every two metres. We generally do not perform reverse circulation drilling.

During the MAE programs, core was split in half using a diamond saw and was sampled over one metre intervals unless a different interval was required because of the geology. During the Andean programs, core samples collected for analysis were typically one metre in length, but ranged from 20 centimetres to three metres. Our exploration sampling protocols call for samples to be between 0.5 and two metres in length. Samples within the vein are typically one metre or less and are often based on differing vein textures. Samples adjacent to the mineralized zones may be up to two metres. Sampling protocols for our underground infill samples are to collect samples between 0.3 metres and one metre in both un-mineralized and mineralized rock.

The quantity and quality of the lithological, geotechnical, collar, and down-hole survey data collected during the Andean and Goldcorp exploration and infill drill programs are sufficient to support Mineral Resource and Mineral Reserve estimation.

Sampling, Analysis and Data Verification

Several independent, primary assay laboratories have been used for routine analyses of surface drilling samples over the Project history, and include SGS Laboratories, Bondar Clegg Laboratories (now ALS Chemex), Alex Stewart Assayers Argentina SA ("**Alex Stewart**"), and Acme (now Bureau Veritas). Laboratories are certified and independent of Goldcorp.

In mid-2010, sample preparation was moved to the project site using an onsite laboratory staffed by two Acme employees who were assisted by two of our employees. Onsite preparation ceased in 2013 and was transferred to Acme's Mendoza laboratory.

Since mid-2017, sample preparation has been carried out at the Alex Stewart laboratory in Perito Moreno. Samples are analyzed using a 50 grams fire assay to determine gold and silver values. A portion of the pulps are sent on to the Alex Stewart facility in Mendoza for ICP analysis. Approximately 10% of the samples are sent to a second laboratory, Bureau Veritas, for quality control. Alex Stewart is responsible for delivering the prepared pulps to the Bureau Veritas analytical laboratory

From June 2013 until December 2016 all underground drill and mine samples were assayed for gold and silver at the on-site laboratory located at Eureka Camp. The on-site laboratory obtained ISO 9001:2008 certification in June 2013 and is not independent.

Beginning in January 2016, all underground diamond drill and mine production samples have been prepared and assayed at Alex Stewart's Perito Moreno facility. This laboratory is independent and is ISO 9001:2008 and ISO 14001:2004 certified. Plant samples will continue to be analyzed on site.

The sample preparation method typically consists of drying, pulverizing and splitting to generate a 200 gram pulp for assay. The pulverization standard has varied from 85% passing -200 mesh to 95% passing 150 mesh. The underground pulverization standard is 90% -140 mesh.

Assay procedures by Alex Stewart for the initial Andean drill programs included fire assay on a 50 gram sample using an atomic absorption finish, and a 34 element inductively-coupled plasma package. Samples assaying >10 g/t gold were re-assayed using a gravimetric finish.

From the last Andean drilling phase onwards through our programs to present, Acme has analyzed for gold by fire assay with an atomic absorption finish, for silver by aqua regia digestion with an atomic absorption finish, and aqua regia digestion inductively-coupled plasma /mass spectrometry analysis for a multi element suite. Gold results of >10 g/t and silver results of >100 g/t are re-assayed using a fire assay with a gravimetric finish.

QA/QC measures for Andean and Goldcorp programs include the insertion of blanks, duplicates, and both site-specific and commercially available standards. There has been a strong program of check assaying at Cerro Negro with just over 5% of all samples from 2009 to 2013 originally assayed at Acme being submitted for re-assay to ALS Chemex.

All preparation and handling of samples at the Cerro Negro Project site is done by our workforce, and prior to that, by Andean employees. No information regarding sample security for programs prior to those of Andean is available.

During the Andean programs, samples were placed in steel-wire-reinforced plastic bins and held on-site until a sufficient number of samples have been collected for a shipment. Weekly, a private trucking company transported the samples directly to the Acme preparation laboratory in Mendoza, Argentina. The plastic bins were covered with an impermeable tarpaulin that was only removed upon arrival to the laboratory. After delivery the samples were within Acme's control and they were responsible for shipping them to the Santiago analytical facility.

Currently, samples are shipped to Alex Stewart in bins containing large plastic bags, each of which contains five samples that are securely closed. Shipments of samples are collected from the core shack by a contracted truck whenever a batch of 300 or more samples is ready - These are then transported to the Alex Stewart facility located at Perito Moreno for sample preparation and chemical analysis.

The most recent external data verification review was performed in 2014 and reported on an audit of the project database. The data in the Cerro Negro database for the Bajo Negro, Mariana Central, Mariana Norte, San Marcos and Vein Zone vein systems and other exploration targets were found to be exceptionally free of errors. Errors that were identified were not material and were easily able to be

investigated and corrected. The data are of very good quality, reliable and can be depended on for resource estimation.

The review investigated QA/QC results from surface exploration and underground infill drilling programs and concluded:

- Results indicate that the analytical procedures employed by the analytical laboratories are generally reliable and repeatable;
- Accuracy and precision are acceptable;
- Analyses of standards and duplicates indicate that there are no significant biases to suggest over or under-reporting of assay values; and
- The QA/QC protocols we used are in keeping with best industry practices and adequate to support Mineral Resource estimation and mine planning.

The quality of the analytical data is sufficiently reliable to support Mineral Resource and Mineral Reserve estimation and that sampling, analysis, and security are generally performed in accordance with exploration best practices and industry standards.

A number of data verification programs and audits have been performed over Cerro Negro's history, primarily in support of technical reports, but also to verify that data collected were sufficiently reliable for the purposes of Mineral Resource and Mineral Reserve estimation.

Mineral Reserve and Mineral Resource Estimates

The following table sets forth the Mineral Reserve estimation for the Cerro Negro Mine effective December 31, 2018:

Proven and Probable Mineral Reserves ⁽¹⁾⁽²⁾⁽³⁾⁽⁴⁾⁽⁵⁾⁽⁶⁾⁽⁷⁾⁽⁸⁾					
Category	Tonnes (millions)	Grade		Contained Metal	
		Gold (grams per tonne)	Silver (grams per tonne)	Gold (millions of ounces)	Silver (millions of ounces)
Proven	3.68	8.11	63.43	0.96	7.51
Probable	14.15	8.92	60.88	4.06	27.69
Proven + Probable	17.83	8.75	61.40	5.02	35.20

Notes:

- (1) The Mineral Reserves for the Cerro Negro Mine set out in the table above have been reviewed and approved by Patrick Garretson, SME Registered Member, Director, Resources and Reserves at Goldcorp, and a qualified person under NI 43-101.
- (2) The Mineral Reserves are classified as Proven and Probable, and are based on the CIM Definition Standards.
- (3) Mineral Reserves are estimated based on a gold price of \$1,200 per ounce and a silver price of \$18.00 per ounce.
- (4) For underground estimates, a cut-off grade ranging from 4.80 to 5.00 g/t gold equivalent is used as an economic indicator only, and is dependent upon deposit location. Operating costs used for cut-off grade derivation range from \$162.10 to \$166.50 per tonne for underground mining (mining \$71.50 to \$75.90 per tonne; processing \$30.83 per tonne; G&A \$59.74 per tonne) to \$31.00 per tonne (mining \$6 per tonne, processing \$25 per tonne) plus \$21.00 per ounce (G&A) for surface mining. The Vein Zone cut-off grade is 0.97 g/t gold equivalent.
- (5) The estimated gold metallurgical recovery rate is 95% for Eureka, Mariana Central and Mariana Central SE / Emilia deposits, 90% for Mariana Norte, Mariana Norte Este Beta, San Marcos, Bajo Negro and Vein Zone deposits and 94.5% for Silica Cap. Silver metallurgical recovery is estimated at 83% for Eureka, Mariana Central, and Mariana Central SE / Emilia deposits; 75% for San Marcos and Bajo Negro deposits, 70% for Mariana Norte, Mariana Norte Este Beta and Silica Cap deposits, and 60% for the Vein Zone deposit.
- (6) Underground mining dilution assumes a minimum mining width of 4.0 metre and a minimum 1.00 metre overbreak on each stope sidewall depending upon zone, and dilution grade estimated from the block model. Open pit mining dilution is taken into account through the chosen block size which represents the expected SMU.
- (7) Underground Mineral Reserves take into account a 95% mining recovery and open pit mining 100% recovery.
- (8) Tonnages and ounces are rounded to the nearest 10,000 tonnes and 10,000 ounces respectively, grades are rounded to two decimal places; numbers may not add due to rounding.

We believe that the major risk factors that can affect the Mineral Reserves estimates are: exchange rate assumptions, capital and operating cost assumptions, royalties and taxes, geotechnical stability, dilution assumptions, environmental and permitting status, and maintaining a social license to operate.

The following table sets forth the Mineral Resource estimations for the Cerro Negro Mine effective December 31, 2018:

Measured, Indicated and Inferred Mineral Resources ⁽¹⁾⁽²⁾⁽³⁾⁽⁴⁾⁽⁵⁾⁽⁶⁾⁽⁷⁾⁽⁸⁾⁽⁹⁾
(excluding Proven and Probable Mineral Reserves)

Category	Tonnes (million)	Grade		Contained Metal	
		Gold (grams per tonne)	Silver (grams per tonne)	Gold (millions of ounces)	Silver (millions of ounces)
Measured	1.12	4.53	41.33	0.16	1.49
Indicated	6.34	5.35	36.01	1.09	7.34
Measured + Indicated	7.46	5.23	36.81	1.25	8.83
Inferred	1.13	4.63	25.04	0.17	0.91

Notes:

- (1) The Mineral Resources for the Cerro Negro Mine set out in the table above have been reviewed and approved by Patrick Garretson, SME Registered Member, Director, Resources and Reserves at Goldcorp, and a qualified person under NI 43-101. The Mineral Resources are classified as Measured, Indicated and Inferred, and are based on the CIM Definition Standards.
- (2) All Mineral Resources are reported exclusive of those Mineral Resources that were converted to Mineral Reserves and do not include dilution.
- (3) Mineral Resources are not known with the same degree of certainty as Mineral Reserves and do not have demonstrated economic viability.
- (4) Mineral Resources are reported at a gold price of \$1,400 per ounce, a silver price of \$20 per ounce. Mineral Resources are defined within Lerchs-Grossmann pit shells or have been confined using appropriate underground mining constraints.
- (5) The cut-off grade for the Vein Zone open pit is 0.82 g/t gold equivalent. The cut-off grade for the underground deposits ranges from 4.10 to 4.30 g/t gold equivalent. For equivalency purposes a gold:silver ratio of one ounce of gold to between 80.12 and 94.50 ounces of silver is used for the underground deposits, depending on the deposit; a gold:silver ratio of one ounce of gold to 105 ounces of silver is used for the Vein Zone open pit deposit. Operating costs used for cut-off grade derivation range from \$162.10 to \$166.50 per tonne for underground mining (mining \$71.50 to \$75.90 per tonne; processing \$30.83 per tonne; G&A \$59.74 per tonne) to \$31.00 per tonne (mining \$6 per tonne, processing \$25 per tonne) plus \$21.00 per ounce (G&A) for surface mining.
- (6) The estimated gold metallurgical recovery rate is 95% for Eureka, Mariana Central and Mariana Central SE / Emilia deposits, 90% for Mariana Norte, Mariana Norte Este Beta, San Marcos, Bajo Negro and Vein Zone deposits and 94.5% for Silica Cap. Silver metallurgical recovery is estimated at 83% for Eureka, Mariana Central, and Mariana Central SE / Emilia deposits; 75% for San Marcos and Bajo Negro deposits, 70% for Mariana Norte, Mariana Norte Este Beta and Silica Cap deposits, and 60% for the Vein Zone deposit.
- (7) Tonnages and ounces are rounded to the nearest 10,000 tonnes and 10,000 ounces respectively, grades are rounded to two decimal places.
- (8) Rounding as required by reporting guidelines may result in apparent summation differences between tonnes, grade and contained metal content.
- (9) Tonnage and grade measurements are in metric units. Contained gold and silver ounces are reported as troy ounces.

Factors that may affect the estimates include metal prices and exchange rate assumptions; assumptions which are to constrain Mineral Resources, including mining, processing and general and administrative costs, metal recoveries, geotechnical and hydrogeological assumptions; and assumptions that the operation will maintain the social licence to operate.

Mining Operations

With the exception of the Vein Zone and San Marcos surface outcrop, all deposits will be mined by underground mining methods.

A combination of transverse and longitudinal long-hole sublevel stoping methods with cemented rock backfill are currently being used at the Eureka and Mariana Central mines. The determination of which method is used is made based on geometries and the rock quality. Generally, transverse stoping is used in wider ore zones and areas where high grades along the contact require parallel drilling. Longitudinal stoping is used whenever practical in narrower zones to reduce development requirements. In certain

areas, a modified Avoca mining method is used, which constitutes a longitudinal long-hole method with a rolling backfill front following the mining of ore in a single direction along strike. These methods are planned to be used to mine the other underground deposits at Cerro Negro Mine.

Ore extraction is carried out by load-haul-dump vehicles with capacities ranging from 4.0 cubic metres to 5.4 cubic metres. These units muck the ore from the stopes and haul it to a temporary stockpile located in the haulage drift or directly to trucks. Then the ore is loaded into trucks with capacities between 33 tonnes and 40 tonnes to be hauled to the surface and dumped, depending on grade, into high-, medium-, low- or marginal-grade stockpiles. The ore is then transported to the plant in haul trucks with capacities of 35 tonnes to 40 tonnes.

Due to its small size, the San Marcos deposit will be mined with open pit methods in a single phase. The mine plan for the Vein Zone deposit considers a two-phase open pit operation, in order to allow quicker access to ore and a smoother ore flow and stripping ratio over the life of the pit. Both phases will be mined concurrently with the underground mines. Both deposits will be mined using standard open pit mining methods using drilling, blasting, loading and hauling operations at a scale suitable for selective ore mining.

Surface mining at the San Marcos open pit is planned to begin in late 2019, and Cerro Negro Mine will continue to evaluate potential surface mining opportunities to provide a supplemental source of additional mill feed.

The mine plan includes maintaining a stockpile of ore on the run-of-mine pad near the crusher. At June 30, 2018, the surface ore stockpile consisted of approximately 4,000 tonnes.

Waste storage has been designed for all deposits. During backfilling, the waste stockpiles will be totally consumed. Waste from Vein Zone's LOM will be stored in a single waste dump. We are not aware of any significant environmental, social or permitting issues that would prevent continued exploitation of the Cerro Negro Mine deposits.

Processing and Recovery Operations

The Cerro Negro processing plant consists of conventional metallurgical technology suitable for the style of ore mineralization. The process plant and associated service facilities process run-of-mine ore delivered to the primary crusher. The process encompasses crushing and grinding of the run-of-mine ore, agitated leaching, counter-current decantation, solution clarification, zinc precipitation and smelting to produce gold/silver bars that are shipped to a refinery for further processing. The counter-current decantation tailings are washed to recover cyanide prior to being detoxified and pumped to the tailings storage facility. The plant commenced initial feed on July 5, 2014 and first gold was poured on July 25, 2014. The plant has operated consistently at 4,000 metric tonnes per day when feed has been available from the mines.

LOM production as of December 31, 2018 was 4.24 million tonnes processed at 14.0 g/t gold and 146 g/t silver. Approximately 1.81 million ounces of gold and 16.9 million ounces of silver have been poured over the LOM as of December 31, 2018. This only includes production after commencement of commercial production on January 1, 2015.

The Cerro Negro Mine produces and sells gold and silver doré to generate revenue. Cerro Negro Mine's bullion is sold on the spot market at prices fixed by the London Bullion Market Association.

Infrastructure, Permitting and Compliance Activities

Water for potable and industrial use at Cerro Negro Mine is supplied from bored wells at various locations. Permanent power from the national grid was achieved on February 2, 2015. The Cerro Negro Mine has no formal settlements within its boundaries and the closest towns are Perito Moreno (population 11,000), located approximately 75 kilometres by road, and Las Heras (population 18,000), which is located 107 kilometres to the northeast and can provide basic services. Most supplies and services are

sourced from Caleta Olivia, Comodoro Rivadavia or Buenos Aires. There is an available workforce that requires continuous training.

All required Argentine State and Federal permits have been obtained. Compliance with the permits is closely monitored by our workforce and government personnel. Applications for new permits are submitted in a timely manner to ensure no stoppages because of the lack of permits.

Environmental baseline studies and on-going environmental monitoring exceed the minimum requirements of the applicable regulatory agencies. Reporting is current and in accordance with Argentine law.

Capital and Operating Costs

Capital cost estimates are based on the latest mine construction data, budgetary figures and quotes provided by suppliers. Capital cost estimates include funding for infrastructure, mobile equipment, development and permitting, and miscellaneous costs. Infrastructure requirements were incorporated into the estimates as needed. Sustaining capital costs reflect current price trends. Capital cost estimates are based on the 2019 LOM budget.

Area	Life-of-Mine (\$ million)
Sustaining	\$492
Expansionary	\$441
Total	\$933

Operating cost estimates are based on the 2019 LOM budget, which includes estimates from first principles for major items and allowances or estimates for minor costs. The estimated average annual operating cost is \$181 per tonne while the property is operating at steady-state production. This consists of \$31 per tonne for processing, \$78 per tonne for mining, and \$72 per tonne for general and administrative costs. Inflation of future capital and operating costs in local currency is expected to be partially offset by devaluation of the local currency with respect to the US\$, and assumptions for these factors are included in the estimates presented.

Area	Life-of-Mine (\$ per tonne)
Process Plant	\$31.00
Mining Operations	\$78.00
G&A & Other	\$72.00
Total	\$181.00

Exploration, Development and Production

Significant exploration potential remains within the Cerro Negro Mine Property. Regionally, the low-sulphidation epithermal gold–silver-bearing quartz veins occur in two clusters. Significant potential exists to increase the known mineralization of the West Cluster (between San Marcos and Eureka Vein) by continued drilling of the currently known gold–silver quartz veins. Known veins in the East Cluster (Vein Zone – Silica Cap – Bajo Negro) are also been explored by drilling.

Continued geologic mapping and prospecting between the East and West clusters in the central portion of the property will be focused on extending mineralized zones beneath relatively thin post-mineral cover dominated by alluvium and lacustrine sedimentary units. The veins for which Mineral Resources have been estimated to date are still expected to have potential for expansion either along strike or down dip.

At the Cerro Negro Mine, gold production for 2019 is expected to be in the range of 450,000 to 485,000 ounces. See “Risk Factors – Our financial projections rely on estimates of future production and

estimates of future production may not be reliable, which could have a negative impact on our future cash flows, business, results of operations and financial condition” and “Risk Factors – Recently opened mines may never reach full production, which would have an adverse effect on our cash flows and results of operations”.

RISK FACTORS

Our business is the acquisition, exploration, development and operation of mining properties. Due to the high-risk nature of our business, our operations are speculative. The risk factors described below are not the only risks and uncertainties that we face. Additional risks and uncertainties not presently known to us or that we currently consider immaterial may also impair our business operations. These risk factors could materially affect our future operating results and could cause actual events to differ materially from those described in our forward-looking statements.

Mining operations generally involve a high degree of risk that cannot be eliminated, which can adversely impact our profitability and financial performance.

Our operations are subject to all of the hazards and risks normally encountered in the exploration, development and production of gold, silver, zinc, copper and lead including unusual and unexpected geologic formations, seismic activity, rock bursts, rock slides, ground or slope instabilities or failures, cave-ins, mechanical failures, flooding and other conditions involved in the drilling and removal of material, any of which could result in damage to, or destruction of, mines and other producing facilities, damage to life or property, environmental damage and possible legal liability. Mining and milling operations are subject to hazards such as equipment failure or failure of retaining dams around tailings disposal areas which may result in environmental pollution and consequent liability. The waste rock (including overburden) and tailings produced in our mining operations represent its largest volume of waste. Managing the volume of waste rock and tailings presents significant environmental, safety and engineering challenges and risks. Waste rock dumps and structures must be engineered, constructed, and monitored to ensure structural stability, to avoid structural collapse, and to monitor the precipitation flow through the waste rock dump, which flow may contain acidic components and potentially mobilize unwanted metals. A failure of any of these structures may result in environmental pollution or damage and consequent liability.

We maintain large leach pads and tailings impoundments containing viscous material, effectively large rock structures containing both fine sand and coarse rock, which must be engineered, constructed and monitored to assure structural stability and avoid leakages or structural collapse. Our tailings impoundments must have effective programs to suppress fugitive dust emissions, and we must effectively monitor and treat acid rock drainage of a structural nature in tailings facilities at all of our operations. The failure of tailings and other impoundments at any of our mining operations could cause severe property and environmental damage and loss of life.

Our business is largely concentrated in a single industry and, as a result, our business may be negatively impacted by fluctuations in the gold mining industry generally.

We are concentrated in the gold mining industry, and as such, our profitability will be sensitive to changes in, and our performance will depend to a greater extent on, the overall condition of the gold mining industry. We may be susceptible to an increased risk of loss, including losses due to adverse occurrences affecting us more than the market as a whole, as a result of the fact that our operations are concentrated in the gold mining sector.

Decreases in commodity prices could render our business no longer economically viable.

The majority of our revenues are derived from the sale of gold, silver and zinc, and to a lesser extent, copper and lead. The price of our Common Shares, our financial results and exploration, and our development and mining activities in the future may be materially adversely affected by a decline in the price of gold, silver, zinc, copper and lead. Gold, silver, zinc, copper and lead prices fluctuate widely and are affected by numerous factors beyond our control, such as the sale or purchase of metals by various

central banks and financial institutions, interest rates, exchange rates, inflation or deflation, fluctuation in the value of the United States dollar and foreign currencies, global and regional supply and demand, and the political and economic conditions of major metals-producing and metals-consuming countries throughout the world. Future price declines could cause continued development of and commercial production from certain of our properties to be uneconomic. Depending on the price of gold, silver, zinc, copper and lead, cash flow from mining operations may not be sufficient and we could be forced to discontinue production at, may lose our interest in, or may be forced to sell, some of our properties. Future production from our mining properties is dependent on the price of gold, silver, zinc, copper and lead that are adequate to make these properties economically viable.

Decreases in commodity prices could negatively impact our Mineral Reserve calculations and, therefore, our results of operations.

If our Mineral Reserve calculations and life-of-mine plans are required to be revised using significantly lower gold, silver, zinc, copper and lead prices, as a result of a decrease in commodity prices, this could result in material write-downs of our investment in mining properties and increased amortization, reclamation and closure charges.

Decreases in commodity prices could impact the feasibility of our projects.

Declining commodity prices can impact operations by requiring a reassessment of the feasibility of a particular project. Such a reassessment may be the result of a management decision or may be required under financing arrangements related to a particular project. Even if the project is ultimately determined to be economically viable, the need to conduct such a reassessment may cause substantial delays or may interrupt operations until the reassessment can be completed.

Our financial projections rely on estimates of future production and estimates of future production may not be reliable, which could have a negative impact on our future cash flows, business, results of operations and financial condition.

We prepare estimates and projections of our future production. Any such information is forward-looking and no assurance can be given that such estimates will be achieved. These estimates are based on existing mine plans and other assumptions which change from time to time, including the availability, accessibility, sufficiency and quality of ore, our costs of production, our ability to sustain and increase production levels, the sufficiency of our infrastructure, the performance of our workforce and equipment, our ability to maintain and obtain mining interests and permits and our compliance with existing and future laws and regulations. Our actual production may vary from estimates for a variety of reasons, including: actual ore mined varying from estimates of grade, tonnage, dilution and metallurgical and other characteristics; short-term operating factors relating to the Mineral Reserves, such as the need for sequential development of orebodies and the processing of new or different ore grades; revisions to mine plans; unusual or unexpected orebody formations; risks and hazards associated with mining; natural phenomena, such as inclement weather conditions, water availability, floods, and earthquakes; and unexpected labour shortages, strikes, local community opposition or blockades. Failure to achieve the estimated forecasts could have an adverse impact on our future cash flows, business, results of operations and financial condition.

It is impossible to ensure that the exploration or development programs planned by us or any of our joint venture partners will result in a profitable commercial mining operation.

The exploration for and development of mineral deposits also involves significant risks. Few properties that are explored are ultimately developed into producing mines. Major expenses are typically required to locate and establish Mineral Reserves, to develop metallurgical processes and to construct mining and processing facilities at a particular site. Our ability to maintain, or increase, our annual production of gold, silver, zinc, copper and lead depends in significant part on our ability to bring these projects into production and to expand existing mines. We utilize the operating history of our existing mines to derive estimates of future operating costs and capital requirements, but such estimates may differ materially from actual operating results at new mines or at expansions of existing mines.

Whether a mineral deposit will be commercially viable depends on a number of factors, which include, among other things, the following:

- the interpretation of geological data obtained from drill holes and other sampling techniques;
- feasibility studies (which include estimates of cash operating costs based upon anticipated tonnage and grades of ore to be mined and processed);
- the particular attributes of the deposit, such as size, grade and metallurgy; expected recovery rates of metals from the ore;
- proximity to infrastructure and labour; the ability to acquire and access land; the availability and cost of water and power; anticipated climatic conditions;
- cyclical metal prices; fluctuations in inflation and currency exchange rates;
- higher input commodity and labour costs; and
- government regulations, including regulations relating to prices, taxes, royalties, land tenure, land use, importing and exporting of minerals and environmental protection.

Some of our development projects are also subject to the successful completion of final feasibility studies, issuance of necessary permits and other governmental approvals and receipt of adequate financing. The exact effect of these factors cannot be accurately predicted, but the combination of any of these factors may adversely affect our business.

The actual operating results of our development projects may differ materially from those anticipated, and uncertainties related to operations are even greater in the case of development projects. Future development activities may not result in the expansion or replacement of current production with new production, or one or more of these new projects may be less profitable than currently anticipated or may not be profitable at all, any of which could have a material adverse effect on our results of operations and financial position.

We may be unable to maintain or increase our annual production of gold, silver, zinc, copper and lead.

Although our activities are primarily directed towards mining operations, our activities also include the exploration for, and development of, mineral deposits. We must continually explore to replace and expand our Mineral Reserves and Mineral Resources as our mines produce gold, silver, zinc, copper and lead. Our ability to maintain or increase our annual production of gold, silver, zinc, copper and lead depends in significant part on our ability to find new Mineral Reserves and Mineral Resources, to bring new mines into production, and to expand Mineral Reserves and Mineral Resources at existing mines. We can provide no assurance that we will be able to maintain or increase our annual production, bring new mines into production or expand the Mineral Reserves and Mineral Resources at our existing mines.

The viability and profitability of our business are exposed to risk as a result of the political uncertainties inherent in some of the foreign jurisdictions in which we operate.

The majority of our foreign operations are conducted in Mexico, Argentina, the Dominican Republic and Chile, and, as such, our operations are exposed to various levels of political, economic and other risks and uncertainties. These risks and uncertainties vary from country to country and include, but are not limited to:

- terrorism;
- hostage taking;
- military repression;
- expropriation;
- extreme fluctuations in currency exchange rates;
- high rates of inflation;
- labour unrest, opposition or blockades;
- the risks of war, civil unrest, protests or blockades;

- renegotiation or nullification of existing concessions, licenses, permits and contracts; ability of governments to unilaterally alter agreements; government imposed local contracting and purchase laws, including laws establishing, among other things, profit margins, production quotas, maximum and minimum price levels and the ability to confiscate merchandise in certain circumstances;
- surface land access issues;
- illegal mining;
- changes in taxation policies, practices, regulations and laws and the application thereof;
- restrictions on foreign exchange and repatriation; and
- changing political conditions, currency controls and governmental regulations that impose local procurement requirements or require foreign contractors to employ citizens of, or purchase supplies from, a particular jurisdiction.

In addition, adverse changes in mining or investment policies or shifts in political attitude in Mexico, Argentina, the Dominican Republic and Chile may adversely affect our operations or profitability. Operations may be affected in varying degrees by government regulations with respect to, but not limited to, restrictions on production, price controls, export controls, import restrictions on equipment, services and supplies, currency remittance, income taxes, expropriation of property, foreign investment, maintenance of claims, environmental legislation, land use, surface land access, land claims of local people, water use and mine safety.

Failure to comply strictly with applicable laws, regulations and local practices relating to mineral rights applications and tenure, environmental requirements, land and water use, could result in loss, reduction or expropriation of entitlements, or the imposition of additional local or foreign parties as joint venture partners with carried or other interests. The occurrence of these various factors and uncertainties related to the economic and political risks of operating in foreign jurisdictions cannot be accurately predicted and could have a material adverse effect on our operations or profitability.

Our operations are subject to economic uncertainties as a result of our foreign operations.

As governments continue to struggle with deficits and concerns over the effects of depressed economies, the mining and metals sector has been targeted to raise revenue. Governments are continually assessing the fiscal terms of the economic rent for a mining company to exploit resources in their countries. Numerous countries, including, but not limited to, Argentina, Australia, Brazil, Chile, the Dominican Republic, Guatemala, Honduras, Mexico and Venezuela, have implemented changes to their respective mining regimes that reflect increased government control or participation in the mining sector, including, but not limited to, changes of law affecting foreign ownership and takeovers, mandatory government participation, taxation and royalties, working conditions, rates of exchange, exchange control, exploration licensing, export duties, repatriation of income or return of capital, environmental protection, as well as requirements for local goods, supplies and employment of local and community staff or contractors or other benefits to be provided to local residents. The occurrence of the various factors and uncertainties related to the economic risks of operating in foreign jurisdictions cannot be accurately predicted and could have a material adverse effect on our operations or profitability.

Our operations in multiple tax jurisdictions increase our susceptibility to sudden tax changes, which can have a material adverse effect on our profitability.

The introduction of new tax laws, regulations or rules, or changes to, or differing interpretation of, or application of, existing tax laws, regulations or rules in Canada, Barbados, Switzerland, Mexico, Argentina, the Dominican Republic and Chile or any of the countries in which our operations or business is located, could result in an increase in our taxes, or other governmental charges, duties or impositions, or an unreasonable delay in the refund of certain taxes owing to us. No assurance can be given that new tax laws, rules or regulations will not be enacted or that existing tax laws will not be changed, interpreted or applied in a manner that could result in our profits being subject to additional taxation, result in us not recovering certain taxes on a timely basis or at all, or that could otherwise have a material adverse effect on us.

Changes in mining or investment policies or shifts in political attitude in Canada, Mexico, Argentina, the Dominican Republic, Chile, Barbados or Switzerland may adversely affect our operations or profitability.

Operations may be affected to varying degrees by government regulations with respect to, but not limited to: restrictions on production; price controls; export controls; import restrictions, such as restrictions applicable to, among other things, equipment, services and supplies; currency remittance; income taxes; expropriation of property; foreign investment; maintenance of mineral claims; environmental legislation; land use; surface land access; land claims of local people; water use; and mine safety. Failure to comply strictly with applicable laws, regulations and local practices relating to mineral right applications and tenure, could result in loss, reduction or expropriation of entitlements, or the imposition of additional local or foreign parties as partners with carried or other interests and may adversely affect our operations or profitability.

Failure to achieve estimates or material increases in costs could have an adverse impact on our future cash flows, business, results of operations and financial condition.

We prepare budgets and estimates of cash costs and capital costs of production for each of our operations and our main costs relate to material costs, workforce and contractor costs, energy costs and closure and reclamation costs. As a result of the substantial expenditures involved in the development of mineral projects and the fluctuation of costs over time, development projects and operating mines may be prone to material cost overruns. Our actual costs may vary from estimates for a variety of reasons, including: short-term operating factors; revisions to mine plans; risks and hazards associated with mining; natural phenomena, such as inclement weather conditions, water availability, floods, and earthquakes; and unexpected labour issues, labour shortages, strikes or community blockades. Operational costs may also be affected by a variety of factors, including: changing waste-to-ore ratios, ore grade metallurgy, labour costs, cost of commodities, general inflationary pressures and currency exchange rates. Many of these factors are beyond our control.

Furthermore, delays in the construction and commissioning of mining projects or other technical difficulties may result in even further capital expenditures being required. Any delay in the development of a project, or cost overruns or operational difficulties once the project is fully developed, may have a material adverse effect on our business, results of operations and financial condition.

Recently opened mines may never reach full production, which would have an adverse effect on our cash flows and results of operations.

Our recently opened mines that commenced commercial production in 2015, the Cerro Negro Mine and the Éléonore Mine, are subject to risks associated with new mine development, including delays in existing operations, a change in the Mineral Reserve or Mineral Resource estimates arising from enhanced understanding of the geological complexity of an ore body and the overall geological model of the deposit and unanticipated costs. We are continually reviewing these operations with the goal of optimizing operational performance, right sizing the business model and improving the return on our investment, including: drilling programs to better define the geological complexity of an ore body and the overall geological model of the deposit; optimization of the life of mine geotechnical stoping sequence to minimize geotechnical stresses, improve mining dilution, productivity and employee safety; enhancing the reliability of the Mineral Resource model and classification parameters to more accurately reflect the geological complexity observed to date in some zones of the deposit; optimization of a variety of mining methods and stope geometries to provide greater versatility to productive mining; and rationalizing the direct operating, administration and capital costs to right size all components of the operation to an optimized life of mine strategy. As a result of continuous reviews, there may be reclassification of Mineral Reserves and Mineral Resources, which could adversely affect our results of operations.

Our production forecasts are based on full production being achieved at all our mines based on the current mine plan, including the mines that commenced commercial production in 2015, and our ability to achieve and maintain full production rates at these mines is subject to a number of risks and

uncertainties. Production from these mines may be lower than anticipated if the anticipated full production rate cannot be achieved which may adversely affect our cash flows and results of operations.

Changes in laws could adversely affect our results of operations.

Our mining, processing, development and mineral exploration activities are subject to various laws governing prospecting, development, production, taxes, labour standards and occupational health, mine safety, toxic substances, land use, water use, land claims of local and indigenous people and other matters. No assurance can be given that new rules and regulations will not be enacted or that existing rules and regulations will not be applied in a manner which could limit or curtail production or development. Amendments to current laws and regulations governing operations and activities of mining and milling or more stringent implementation thereof could have a material adverse impact on our operations and financial position. Changes to laws regarding mining royalties or taxes, or other elements of a country's fiscal regime, may also adversely affect our costs of operations and financial results.

In addition, as governments continue to struggle with deficits and concerns over the effects of depressed economies, the mining and metals sector has been targeted to raise revenue. Governments are continually assessing the fiscal terms of the economic rent for a mining company to exploit resources in their countries. Numerous countries, including, but not limited to, Argentina, Australia, Brazil, Chile, the Dominican Republic, Guatemala, Honduras, Mexico and Venezuela, have implemented changes to their respective mining regimes that reflect increased government control or participation in the mining sector, including changes of law affecting foreign ownership and take-overs, mandatory government participation, taxation and royalties, working conditions, rates of exchange, exchange control, exploration licensing, export duties, repatriation of income or return of capital, environmental protection, as well as requirements for local procurement of goods, supplies and employment or other benefits to be provided to local residents.

The occurrence of mining regime changes in both developed and developing countries adds uncertainties that cannot be accurately predicted and any future adverse changes in government policies or legislation in the jurisdictions in which we operate that affect foreign ownership, mineral exploration, development or mining activities, may affect our viability and profitability.

We do not have direct ownership or possession rights to use the surface of the lands for our Mexican mining operations.

Article 27 of the Mexican Constitution and subsequent legislation established the "ejido" and communal landholding as forms of land tenure in Mexico. Ejidos are structured as communities or townships with internal administration and surveillance boards. Ejido property is land granted by the Mexican government to individuals for agricultural and ranching purposes that may exist either for the exclusive use of an individual beneficiary (the "parcels"), or for the common benefit of the Ejido (the "communal land"), both subject to the Mexican Agrarian Law. There are more than 20 ejido communities in the vicinity of our Mexican mining operations and ejido lands cover most of the lands used by us for our current mining operations at our Peñasquito Mine and nearby exploration activities. We enter into temporary occupation agreements ranging from five to 30 years with the ejido communities, which allow us to use the surface of the lands for our mining operations. In Mexico, mining rights that are covered under a concession do not include direct ownership or possession rights over the surface, or surface access, and at any particular time we may be involved in negotiations with various ejido communities to enter into new temporary occupation agreements or other surface access agreements or amend existing agreements. Failure to reach new agreements or disputes regarding existing agreements may cause, blockades, suspension of operations, delays to projects, and on occasion, may lead to legal disputes.

Mining operations involve health and personal safety hazards that could adversely affect our reputation, business and future operations.

Workers involved in our operations are subject to many inherent health and safety risks and hazards, including, but not limited to, rock bursts, cave-ins, floods, falls of ground, tailings dam failures, chemical hazards, mineral dust and gases, use of explosives, noise, electricity and moving equipment (especially heavy equipment) and slips and falls, which could result in occupational illness or health issues, personal

injury, and loss of life, and/or facility and workforce evacuation. These risks cannot be eliminated and may adversely affect our reputation, business and future operations.

We are exposed to liquidity and counterparty risks.

We are exposed to liquidity and various counterparty risks including, but not limited to:

- financial institutions that hold our cash;
- companies that have payables to us, including concentrate customers;
- our insurance providers;
- our lenders;
- our other banking counterparties;
- companies that have received deposits from us for the future delivery of equipment; and
- joint venture partners.

We are also exposed to liquidity risks in meeting our capital expenditure requirements in instances where cash positions are unable to be maintained or appropriate financing is unavailable. These factors may impact our ability to obtain loans and other credit facilities in the future and, if obtained, on terms favourable to us. Furthermore, actions taken by central banks to impact fiscal and monetary policies have increased levels of volatility and market turmoil. As a result of this uncertainty, our planned growth could be adversely impacted, and the trading price of our securities could be adversely affected.

Our failure to strictly comply with anti-corruption laws could have a material adverse effect on our reputation and results of operations.

Our operations are governed by, and involve interactions with, many levels of government in numerous countries. We are required to comply with anti-corruption and anti-bribery laws, including the Canadian Corruption of Foreign Public Officials Act and the U.S. Foreign Corrupt Practices Act, as well as similar laws in the countries in which we conduct business. In recent years, there has been a general increase in both the frequency of enforcement and the severity of penalties under such laws, resulting in greater scrutiny and punishment to companies convicted of violating anti-corruption and anti-bribery laws. Furthermore, a company may be found liable for violations by not only its employees, but also by its contractors and third-party agents. Our internal procedures and programs may not always be effective in ensuring that we, our employees, contractors or third-party agents will comply strictly with such laws. If we become subject to an enforcement action or in violation of such laws, this may have a material adverse effect on our reputation, result in significant penalties, fines and/or sanctions imposed on us, and/or have a material adverse effect on our operations.

Our failure to strictly comply with Canada's Extractive Sector Transparency Measures Act could have a material adverse effect on our reputation and results of operations.

The Canadian Extractive Sector Transparency Measures Act ("ESTMA"), which became effective June 1, 2015, requires public disclosure of payments to governments by mining and oil and gas companies engaged in the commercial development of oil, gas and minerals who are either publicly listed in Canada or with business or assets in Canada. Mandatory annual reporting is required for extractive companies with respect to payments made to foreign and domestic governments at all levels, including entities established by two or more governments, including Indigenous groups. ESTMA requires reporting on the payments of any taxes, royalties, fees, production entitlements, bonuses, dividends, infrastructure improvement payments, and any other prescribed payment over C\$100,000. Failure to report, false reporting or structuring payments to avoid reporting may result in fines of up to C\$250,000 (which may be concurrent). We commenced ESTMA reporting in 2017, and in 2018, commenced reporting with respect to payments made to Indigenous communities in compliance with the regulation's delayed implementation. If we become subject to an enforcement action or in violation of ESTMA, this may result in significant penalties, fines and/or sanctions imposed on us resulting in a material adverse effect on our reputation.

Our operations in Argentina are susceptible to risk as a result of economic and political instability in Argentina and labour unrest.

There continues to be risks relating to the uncertain and unpredictable political and economic environment in Argentina, especially at the provincial level in Santa Cruz where our Cerro Negro Mine is located. Inflation remains a challenge in Argentina, with the level of inflation during 2018 reaching 47.6%, the highest since 1991. Current estimations for 2019 reflect a possible reduction of inflation to a range of 25 to 30%. Maintaining operating revenues in Argentine pesos could expose us to the risks of peso devaluation and high domestic inflation, especially after the 2019 national elections.

Several new laws were implemented in 2018 that may increase costs at the Cerro Negro Mine. A new 12% export duty was imposed by the national government and is expected to continue until December, 2020. In the province of Santa Cruz, a new local procurement law was passed requiring extractive industries, including mining, to procure at least 50% of their goods and services from registered local providers.

The economic environment in the province of Santa Cruz continues to be fragile. In 2017, the national government agreed to grant a loan to the province, and in exchange the province agreed to comply with certain financial covenants, which may be difficult to achieve. This created some disruption during 2018 and may continue to create additional social disruption during 2019. The risk of economic and social disruption may also increase due to the impact of the 2019 national and provincial elections. Disruptions may include roadblocks by local communities and unions. We can provide no assurance that disruptions from roadblocks will not occur in the future that could adversely affect access to, and operations at, the Cerro Negro Mine.

In addition, during 2018 and the first quarter of 2019, we experienced work stoppages by miners represented by the Asociacion Obrera Minera Argentina (“AOMA”), Province of Santa Cruz delegation at the Cerro Negro Mine. We can provide no assurance that issues with the AOMA or other unions will not occur in the future that could adversely affect operations at the Cerro Negro Mine.

Violence in some jurisdictions negatively impacts our ability to conduct business in such locations.

In recent years, criminal activity and violence has increased in Mexico and Guatemala. Violence between the drug cartels and human trafficking organizations and violent confrontations with authorities has steadily increased. As well, incidents of violent crime, kidnapping for ransom and extortion by organized crime have increased. Many incidents of crime and violence go unreported and law enforcement authorities’ efforts to reduce criminal activity are challenged by a lack of resources, corruption and the power of organized crime. Incidents of criminal activity, trespass, theft and vandalism have occasionally affected our employees, contractors and their families. We can provide no assurance that security incidents, in the future, will not have a material adverse effect on our operations, including reclamation activities, especially if criminal activity and violence continue to escalate. In addition, our response to criminal activities can give rise to additional risks should they not be carried out consistently with international standards relating to the use of force and respect for human rights. Such incidents may halt or delay production, increase operating costs; result in harm to employees, contractors, visitors or community members; decrease operational efficiency due to employee absenteeism and other factors; increase community tensions or otherwise adversely affect our ability to conduct business.

Our current and future operations are subject to a risk that one or more groups of indigenous people may oppose continued operation, further development, or new development of our projects and mines. Such opposition may be directed through legal or administrative proceedings or expressed in manifestations such as protests, roadblocks or other forms of public expression against our activities, and may have a negative impact on our reputation and operations.

Some of our operations are situated in areas presently or previously inhabited or used by indigenous peoples, triggering various international and national laws, codes, resolutions, conventions, guidelines, and imposing obligations on government and companies to respect the rights of indigenous people.

These may include a mandate that government consult with communities surrounding our projects and mines regarding actions affecting local stakeholders, prior to or after granting us mining rights, permits or approvals. Applicable conventions such as the ILO Convention 169, which has been ratified by Argentina, Chile, Guatemala, and Mexico, is an example of such an international convention. Examples of developments in this area include the United Nations Declaration of the Rights of Indigenous People and the International Finance Corporation's revised Performance Standard 7, which requires governments to obtain the free, prior, and informed consent of indigenous peoples who may be affected by government action (such as the granting of mining concessions or approval of mine permits).

There is an increasing level of public concern relating to the perceived effect of mining activities on communities impacted by such activities. The evolving expectations related to human rights, indigenous rights, and environmental protection may result in opposition to our current and future operations or further development or new development of our projects and mines. Such opposition may be directed through legal or administrative proceedings or expressed in manifestations such as protests, roadblocks or other forms of public expression against our activities, and may have a negative impact on our reputation and operations.

Opposition by any of the aforementioned groups to our operations may require modification of, or preclude the operation or development of, our projects and mines or may require us to enter into agreements with such groups or local governments with respect to our projects and mines, in some cases, causing increased cost and considerable delays to the advancement of our projects.

Compliance with environmental laws, including changes to such laws, could adversely affect our results of operations.

Our operations are subject to environmental regulation in the various jurisdictions in which we operate. These regulations mandate, among other things, the maintenance of air and water quality standards and land reclamation. They also set out limitations on the generation, transportation, storage and disposal of solid and hazardous waste. Environmental legislation is evolving in a manner that will likely, in the future, require stricter standards and enforcement, increased fines and penalties for non-compliance, more stringent environmental assessments of proposed projects and a heightened degree of responsibility for companies and their officers, directors and employees. Continuing issues with tailings dam failures at other companies' operations may increase the likelihood that these stricter standards and enforcement mechanisms will be implemented in the future. We can provide no assurance that future changes in environmental regulation will not adversely affect our results of operations. Failure to comply with these laws, regulations and permitting requirements may result in enforcement actions, including orders issued by regulatory or judicial authorities causing operations to cease or be curtailed, and may include corrective measures requiring capital expenditures, installation of additional equipment, or remedial actions. Parties engaged in mining operations or in the exploration or development of mineral properties may also be required to compensate those suffering loss or damage due to the mining activities and may have civil or criminal fines or penalties imposed for violations of applicable laws or regulations. The occurrence of any environmental violation or enforcement action may have an adverse impact on our reputation and could adversely affect our results of operations.

Furthermore, environmental hazards may exist on the properties on which we hold interests that are unknown to us at present and which have been caused by previous or existing owners or operators of the properties.

In addition, production at certain of our mines involves the use of sodium cyanide or other reagents and exposes rock material that could cause toxicity to the environment if released or not properly managed. Should sodium cyanide, other reagents, or contact water be improperly managed, leak or otherwise be discharged from the containment system, we may become subject to liability for clean-up work that may not be insured. In the event of any discharges of pollutants into the ground water and the environment, we may become subject to liability for hazards that we may not be insured against. See “— Not all losses are adequately covered by insurance and such losses may cause us to incur significant costs that could have a material adverse effect upon its financial performance and results of operations” below.

Our Ore/Mineral Reserves and Mineral Resources are estimates only, and no assurance can be given that the anticipated tonnages and grades will be achieved, that the indicated level of recovery will be realized or that Ore/Mineral Reserves could be mined or processed profitably.

There are numerous uncertainties inherent in estimating Ore/Mineral Reserves and Mineral Resources, including many factors beyond our control. Such estimation is a subjective process, and the accuracy of any Ore/Mineral Reserve or Mineral Resource estimate is a function of the quantity and quality of available data and of the assumptions made and judgments used in engineering and geological interpretation. Short-term operating factors relating to the Ore/Mineral Reserves, such as the need for orderly development of the ore bodies or the processing of new or different ore grades, may cause the mining operation to be unprofitable in any particular accounting period. In addition, there can be no assurance that gold, silver, zinc, copper and lead recoveries in small scale laboratory tests will be duplicated in larger scale tests under on-site conditions or during production.

From time to time we may undertake a review of our operations with the goal of optimizing operational performance, right sizing our business model and improving the return on our investment, including: drilling programs to better define the geological complexity of an ore body and the overall geological model of the deposit; optimization of the life of mine geotechnical stoping sequence to minimize geotechnical stresses, improve mining dilution, productivity and employee safety; enhancing the reliability of the Mineral Resource model and classification parameters to more accurately reflect the geological complexity observed to date in some zones of the deposit; optimization of a variety of mining methods and stope geometries to provide greater versatility to productive mining; and rationalizing the direct operating, administration and capital costs to right size all components of the operation to an optimized life of mine strategy.

Fluctuation in gold, silver, copper, zinc or lead prices, results of drilling, metallurgical testing and production and the evaluation of mine plans subsequent to the date of any estimate may require revision of such estimate. The volume and grade of reserves mined and processed and recovery rates may not be the same as currently anticipated.

Any material reductions in estimates of Ore/Mineral Reserves and Mineral Resources, including as a result of the processes outlined above, or of our ability to extract these Ore/Mineral Reserves, could have a material adverse effect on our results of operations and financial condition.

Governments may impose restrictions on our ability to use current mining methods, which would have a serious and adverse impact on our results of operations and financial condition.

There has been increased global attention and the introduction of regulations restricting or prohibiting the use of cyanide and other hazardous substances in mineral processing activities. In addition, the use of open pit mining techniques has come under scrutiny in certain mining jurisdictions, and some governments are reviewing the use of such methods. For example, the Argentinean Congress approved legislation that restricts mining and other industrial activities in areas where glaciers are present. In addition, several provincial governments in Argentina have adopted prohibitions on open pit mining. If legislation restricting or prohibiting the use of cyanide or open pit mining techniques were to be adopted in a region in which we operate, there would be a significant adverse impact on our results of operations and financial position. Additionally, if the use of cyanide were to be restricted or prohibited in a jurisdiction in which our operations rely on the use of cyanide, it would have a significant adverse impact on our results of operations and financial condition as there are few, if any, substitutes for cyanide that are as effective in extracting gold from the ore.

Our business is affected by the global economy.

Global financial conditions continue to be characterized as volatile. In recent years, global markets have been adversely impacted by various credit crises and significant fluctuations in fuel and energy costs and metals prices. Many industries, including the mining industry, have been impacted by these market conditions. Global financial conditions remain subject to sudden and rapid destabilizations in response to future events, as government authorities may have limited resources to respond to future crises. A continued or worsened slowdown in the financial markets or other economic conditions, including but not

limited to consumer spending, employment rates, business conditions, inflation, fuel and energy costs, consumer debt levels, lack of available credit, the state of the financial markets, interest rates and tax rates, may adversely affect our growth and profitability. Future crises may be precipitated by any number of causes, including natural disasters, geopolitical instability, changes to energy prices or sovereign defaults. If increased levels of volatility continue or in the event of a rapid destabilization of global economic conditions, it may result in a material adverse effect on commodity prices, demand for metals, including gold, silver, zinc, copper and lead, availability of credit, investor confidence, and general financial market liquidity, all of which may adversely affect our business and the market price of our securities.

Our failure to continue to source suppliers on reasonable commercial terms could have a material adverse effect on our business, results of operations and financial condition.

Certain raw materials and supplies used in connection with our operations are obtained from a sole or limited group of suppliers (including, for example, truck tires and sodium cyanide). An increase in global demand for such resources and a corresponding decrease in the supplier's inventory would likely cause unanticipated cost increases, an inability to obtain adequate supplies and delays in delivery times, thereby adversely impacting operating costs, capital expenditures and production schedules. If a supplier is unable to adequately meet its requirements over a significant period of time and we are unable to source an alternate third-party supplier on reasonable commercial terms, this could have a material adverse effect on our business, results of operations and financial condition.

We may be unable to obtain or retain necessary permits, which could adversely affect our operations.

Our operations in each of the jurisdictions in which we operate are subject to receiving and maintaining permits (including environmental permits) from appropriate governmental authorities. Furthermore, prior to any development on any of our properties, we must receive permits from appropriate governmental authorities. We can provide no assurance that necessary permits will be obtained, that previously issued permits will not be suspended for a variety of reasons, including through government or court action, or that delays will not occur in connection with obtaining all necessary permits, renewals of permits for existing operations, or additional permits for any possible future changes to operations, or additional permits associated with new legislation. We can provide no assurance that we will continue to hold or obtain, if required to, all permits necessary to develop or continue operating at any particular site, which could adversely affect our operations.

Changes in climate conditions and regulatory regime could adversely affect our business and prospects.

Governments are moving to introduce climate change legislation and treaties at the international, national, state/provincial and local levels. The regulatory requirements are evolving and are not consistent across the jurisdictions in which we operate. However, regulation relating to emission levels (such as carbon taxes) and energy efficiency is becoming more stringent. If the current regulatory trend continues, we expect that this will result in increased costs at some of our operations. In addition, the physical risks of climate change may also have an adverse effect on our operations. These risks include the following:

- Sea level rise: Changes in sea levels could affect ocean transportation and shipping facilities that are used to transport supplies, equipment and workforce to our operations and products from those operations to world markets.
- Extreme weather events: Extreme weather events (such as increased frequency or intensity of hurricanes, increased snow pack, prolonged drought) have the potential to disrupt operations at our mines. Extended disruptions to supply lines could result in interruption to production.
- Resource shortages: our facilities depend on regular supplies of consumables (diesel, tires, sodium cyanide, etc.) and reagents to operate efficiently. In the event that the effects of climate change or extreme weather events cause prolonged disruption to the delivery of essential commodities, our production efficiency is likely to be reduced.

The occurrence of such physical climate change events may result in substantial costs to respond to the event and/or recover from the event, and to prevent recurrent damage, through either the modification of, or addition to, existing infrastructure at our operations. The scientific community has predicted an increase, over time, in the frequency and severity of extraordinary or catastrophic natural phenomena as a result of climate change. We can provide no assurance that we will be able to predict, respond to, measure, monitor or manage the risks posed as a result. Physical climate change events, and the trend toward more stringent regulations aimed at reducing the effects of climate change, could impact our decision to pursue future opportunities, or maintain our existing operations, which could have an adverse effect on our business and our future operations.

We can provide no assurance that efforts to mitigate the risks of climate changes will be effective and that the physical risks of climate change will not have an adverse effect on our operations and profitability.

Unusual or infrequent weather phenomena, sabotage, community, government or other interference in the maintenance or provision of such infrastructure, including power and water supplies, could adversely affect our business, financial condition and results of operations.

Mining, processing, development and exploration activities depend, to one degree or another, on adequate infrastructure. Reliable roads, bridges, power sources and water supply are important determinants, which affect capital and operating costs. Unusual or infrequent weather phenomena, sabotage, community, government or other interference in the maintenance or provision of such infrastructure could adversely affect our business.

A key operational risk is the availability of sufficient power and water supplies to support mining operations. Power and water are both key to the extraction and processing of minerals and metals. Certain of our property interests are located in remote, undeveloped areas and the availability of infrastructure such as water and power at a reasonable cost cannot be assured. Some of our properties are located in areas that have many competing demands for power and water and access to sufficient supplies is not always a guarantee. We can provide no assurance that any solution implemented by us will completely mitigate the risk of water shortages in the future.

An increase in prices of power and water supplies, including infrastructure, could negatively affect our business, financial condition and results of operations.

Our ability to obtain a secure supply of power and water at a reasonable cost depends on many factors, including: global and regional supply and demand; political and economic conditions; problems that can affect local supplies; delivery; and relevant regulatory regimes, all of which are outside our control. We can provide no assurance that we can obtain secure supplies of power and water at reasonable costs at all of our facilities and the failure to do so could have a material adverse effect on our business, financial condition and results of operations.

Failure to secure power, water and access rights could result in delays and negative impacts to our development projects.

Establishing infrastructure for our development projects will require significant resources, identification of adequate sources of raw materials and supplies and necessary cooperation from national and regional governments, none of which can be assured. We can provide no assurance that we will secure these power, water and access rights going forward or on reasonable terms.

Failure to provide regulatory authorities with the required financial assurances could potentially result in the closure of one or more of our operations, which could result in a material adverse effect on our operating results and financial condition.

We are required by various governments in jurisdictions in which we operate to provide financial assurances sufficient to allow a third party to implement approved closure and reclamation plans if we are unable to do so. These laws are complex and vary from jurisdiction to jurisdiction. The laws govern the determination of the scope and cost of the closure and reclamation obligations and the amount and forms of financial assurance.

As of December 31, 2018, we have provided the appropriate regulatory authorities with \$323 million in reclamation financial assurance for mine closure obligations in the various jurisdictions in which we operate. The amount and nature of the financial assurances are dependent upon a number of factors, including our financial condition and reclamation cost estimates. Changes to these amounts, as well as the nature of the collateral to be provided, could significantly increase our costs, making the maintenance and development of existing and new mines less economically feasible. Regulatory authorities may also require further financial assurances. To the extent that the value of the collateral provided to the regulatory authorities is or becomes insufficient to cover the amount of financial assurance we are required to post, we would be required to replace or supplement the existing security with more expensive forms of security, which might include cash deposits, which would reduce our cash available for operations and financing activities. We can provide no assurance that we will be able to maintain or add to our current level of financial assurance or that we will have sufficient capital resources to further supplement our existing security, which could result in a material adverse effect on our operating results and financial condition.

Exchange rate fluctuations may adversely affect the costs that we incur in our operations.

Gold, silver, zinc, copper and lead are sold in US dollars and our costs are incurred principally in US dollars, Canadian dollars, Mexican pesos, Dominican Republic pesos, Argentine pesos and Chilean pesos. The appreciation of non-US dollar currencies against the US dollar can increase the cost of gold, silver, zinc, copper and lead production and capital expenditures in US dollar terms. We also hold cash and cash equivalents that are denominated in foreign currencies that are subject to currency risk. Accounts receivable and other current and non-current assets denominated in foreign currencies relate to goods and services taxes, income taxes, value-added taxes and insurance receivables. We are further exposed to currency risk through non-monetary assets and liabilities of entities whose taxable profit or tax loss are denominated in foreign currencies. We have a financial risk management policy that includes hedging our foreign exchange exposure to reduce the risk associated with currency fluctuations, but we can provide no assurance that such hedging arrangements will be adequate.

We hold interests in joint ventures or joint operations and our interest in these properties is subject to the risks normally associated with the conduct of joint ventures or joint operations.

We hold an indirect 40% interest in the Pueblo Viejo Mine, with the remaining 60% interest held indirectly by Barrick, an indirect 50% interest in the NuevaUnión Project, with the remaining 50% interest held indirectly by Teck, an indirect 50% interest in the Norte Abierto Project, with the remaining 50% interest held indirectly by Barrick, and an indirect 37.5% interest in the Alumbra Mine, the other 12.5% and 50% interests held indirectly by Yamana Gold Inc. and Glencore Queensland, respectively. The existence or occurrence of one or more of the following circumstances and events could have a material adverse impact on our profitability or the viability of our interests held through joint ventures, which could have a material adverse impact on our future cash flows, earnings, results of operations and financial condition:

- disagreements with partners on how to develop and operate mines efficiently;
- inability to exert influence over certain strategic decisions made in respect of properties;
- inability of partners to meet their obligations to the joint venture, joint operation or third parties; and
- litigation between partners regarding joint venture or joint operation matters.

To the extent that we are not the operator of our joint venture or joint operation properties, the success of any operations will be dependent on the operators for the timing of activities related to these properties and we will be largely unable to direct or control the activities of the operators. We are subject to the decisions made by the operator in the operation of the property, and will rely on the operators for accurate information about the properties. We can provide no assurance that all decisions of the operators will achieve the expected goals.

We may not complete acquisition or business arrangements that we pursue, or are pursuing, on favourable terms and cannot assure that any acquisitions or business arrangements completed will ultimately benefit our business.

As part of our business strategy, we have sought and may continue to seek new mining and development opportunities in the mining industry. In pursuit of such opportunities, we may fail to select appropriate acquisition targets or negotiate acceptable arrangements, including arrangements to finance acquisitions or integrate the acquired businesses and their workforce into us. Ultimately, any acquisitions would be accompanied by risks, which could include:

- a significant change in commodity prices after we have committed to complete the transaction and established the purchase price or exchange ratio;
- a material ore body could prove to be below expectations;
- difficulty in integrating and assimilating the operations and workforce of any acquired companies;
- realizing anticipated synergies and maximizing the financial and strategic position of the combined enterprise;
- maintaining uniform standards, policies and controls across the organization;
- disruption of our ongoing business and its relationships with employees, suppliers, contractors and other stakeholders as we integrate the acquired business or assets;
- the acquired business or assets may have liabilities that are more significant than expected or unknown liabilities that may be significant;
- delays as a result of regulatory approvals; and
- exposure to litigation (including actions commenced by shareholders) in connection with the transaction.

Any material issues that we encounter in connection with an acquisition could have a material adverse effect on our business, results of operations and financial position.

Reputation loss may result in decreased investor confidence, increased challenges in developing and maintaining community relations and an impediment to our overall ability to advance our projects, thereby having a material adverse impact on our financial performance, financial condition, cash flows and growth prospects.

Damage to our reputation can be the result of the actual or perceived occurrence of any number of events, and could include any negative publicity (for example, with respect to our handling of environmental matters or our dealings with community groups), whether true or not. The increased usage of social media and other web-based tools used to generate, publish and discuss user-generated content and to connect with other users has made it increasingly easier for individuals and groups to communicate and share opinions and views on us and our activities, whether true or not. We do not ultimately have direct control over how we are perceived by others and reputational loss could have a material adverse impact on our financial performance, financial condition, cash flows and growth prospects.

Our indebtedness could adversely affect our business, financial condition and results of operations and our ability to meet our payment obligations under our indebtedness.

As of December 31, 2018, we had aggregate consolidated indebtedness as set out under the heading "Indebtedness". As a result, we are required to use a portion of our cash flow to service principal and interest on our debt, which will limit the cash flow available for other business opportunities.

Our ability to make scheduled payments of the principal of, to pay interest on, or to refinance our indebtedness depends on our future performance, which is subject to economic, financial, competitive and other factors beyond our control. We may not continue to generate cash flow from operations in the future sufficient to service our debt and make necessary capital expenditures. If we are unable to generate such cash flow, we may be required to adopt one or more alternatives, such as reducing or eliminating dividends, selling assets, restructuring debt or obtaining additional equity capital on terms that may be onerous or highly dilutive. Our ability to refinance our indebtedness will depend on the capital

markets and our financial condition at such time. We may not be able to engage in any of these activities or engage in these activities on desirable terms, which could result in a default on our debt obligations.

The terms of our \$3.0 billion revolving credit facility (the “**Credit Facility**”) require us to satisfy various affirmative and negative covenants and to meet certain financial ratios and tests. These covenants limit, among other things, our ability to incur further indebtedness if doing so would cause us to fail to meet certain financial covenants, create certain liens on assets or engage in certain types of transactions. We can provide no assurances that in the future, we will not be limited in our ability to respond to changes in our business or competitive activities or be restricted in our ability to engage in mergers, acquisitions or dispositions of assets. Furthermore, a failure to comply with these covenants, including a failure to meet the financial tests or ratios, would likely result in an event of default under our Credit Facility and would allow the lenders to accelerate the debt, which could materially and adversely affect our business, financial condition and results of operations and our ability to meet our payment obligations under our debt, and the price of our Common Shares.

An increase in interest rates on our substantial indebtedness could adversely affect our business, financial condition and results of operations.

We are exposed to interest rate cash flow risk primarily on our outstanding debt subject to floating rates of interest, our cash and cash equivalents, and interest-bearing receivables. We are exposed to interest rate fair value risk primarily on our debt subject to fixed rates of interest.

Additional capital or other types of financing may not be available to us if needed or, if available, the terms of such financing may not be favourable to us.

The mining, development, expansion and exploration of our properties, will require ongoing financing as a result of various factors including the potential for rising and unforeseen costs and fluctuations in metal prices. We cannot assure you that we will be able to obtain additional capital to fund our costs, especially if there is a significant decrease in metal prices, at commercially reasonable rates or at all. A failure to obtain any necessary additional financing may result in delaying or indefinite postponement of exploration, development or production on any or all of our properties or even a loss of property interest.

The failure of information systems or a component of information systems could, depending on the nature of any such failure, adversely impact our reputation and results of operations.

Our information systems, and those of our third-party service providers and vendors, are vulnerable to an increasing threat of continually evolving cybersecurity risks. These risks may take the form of malware, computer viruses, cyber threats, extortion, employee error, malfeasance, system errors or other types of risks, and may occur from inside or outside of our organization. Cybersecurity risk is increasingly difficult to identify and quantify and cannot be fully mitigated because of the rapid evolving nature of the threats, targets and consequences. Additionally, unauthorized parties may attempt to gain access to these systems or our information through fraud or other means of deceiving our third-party service providers, employees or vendors. Our operations depend, in part, on how well we and our suppliers protect networks, equipment, information technology (“IT”) systems and software against damage from a number of threats. We have entered into agreements with third parties for hardware, software, telecommunications and other services in connection with our operations. Our operations and mining operations also depend on the timely maintenance, upgrade and replacement of networks, equipment, IT systems and software, as well as pre-emptive expenses to mitigate the risks of failures. However, if we are unable or delayed in maintaining, upgrading or replacing our IT systems and software, the risk of a cyber security incident could materially increase. Any of these and other events could result in information system failures, delays and/or increases in capital expenses. The failure of information systems or a component of information systems could, depending on the nature of any such failure, adversely impact our reputation and results of operations.

In addition, targeted attacks on our systems (or on systems of third parties that we rely on), failure or non-availability of a key IT system or a breach of security measures designed to protect our IT systems could result in disruptions to our operations through delays or the corruption and destructions of our data, extensive personal injury, property damage, loss of confidential information or financial or reputational

risks. As the threat landscape is ever-changing, we must make continuous mitigation efforts, including: risk prioritized controls to protect against known and emerging threats; tools to provide automated monitoring and alerting; and backup and recovery systems to restore systems and return to normal operations. However, there can be no assurance that our ability to monitor for or mitigate cybersecurity risks will be fully effective, and we may fail to identify cybersecurity breaches or discover them in a timely way.

In 2016, we were made aware that our IT systems had been attacked by an external party. While the attack did not result in any material loss to us or interrupt our day-to-day operations, there can be no assurance that we will not experience any such losses in the future. Our risk and exposure to these matters cannot be fully mitigated because of, among other things, the evolving nature of these threats.

Any future significant compromise or breach of our data security, whether external or internal, or misuse of data, could result in additional significant costs, lost sales, fines and lawsuits, and damage to our reputation. In addition, as the regulatory environment related to information security, data collection and use, and privacy becomes increasingly rigorous, with new and constantly changing requirements applicable to our business, compliance with those requirements could also result in additional costs. As cyber threats continue to evolve, we may be required to expend additional resources to continue to modify or enhance protective measures or to investigate and remediate any security vulnerabilities.

Our commodities hedging program may be unsuccessful in reducing the price risk associated with fluctuations in base metals, diesel fuel prices or foreign currencies.

Currently, our policy is to not hedge future gold sales. We currently hedge lead and zinc, to manage price exposure to fluctuations in those base metals, and the Mexican peso, to manage the foreign currency exposure. We may also from time to time hedge our diesel fuel price exposure and other foreign currencies exposure to manage adverse price movements impacting costs specific to diesel fuel prices and foreign currencies. We can provide no assurance that a hedging program designed to reduce the price risk associated with fluctuations in base metals, diesel fuel prices or foreign currencies will be successful. Although hedging may protect us from an adverse price change, it may also prevent us from benefiting fully from a positive price change.

Our inability to attract and retain additional highly skilled employees may adversely affect our business and future operations.

We are dependent on the services of a number of key executives and management personnel. The success of our operations is also dependent on our highly skilled and experienced workforce. There continues to be competition over highly skilled experienced workers. In addition, the development of new mines in geographic areas without an established mining industry requires training of inexperienced workers to staff these new mines. The loss of these persons or our inability to attract and retain additional highly skilled, diverse employees may adversely affect our business and future operations.

The Peñasquito Mine is subject to transportation and marketing risk that could have a negative impact on our ability to operate that Mine.

Concentrates containing combinations of gold, silver, zinc and lead are produced in large quantities at the Peñasquito Mine and loaded onto highway road vehicles for transport to in-country smelters or to sea ports for export to foreign smelters in markets such as Asia, Europe and North America. This type of process involves a high level of environmental and financial risk. We could be subject to potential significant increases in road and maritime transportation charges and treatment and refining charges. Transportation of such concentrate is also subject to numerous risks including, but not limited to, delays in delivery of shipments, road blocks, terrorism, theft, weather conditions and environmental liabilities in the event of an accident or spill. We could be subject to limited smelter availability and capacity and could also face the risk of a potential interruption of business from a third party beyond our control, which in both cases could have a material adverse effect on our operations and revenues. We can provide no assurance that smelting, refining or transportation contracts for the Peñasquito Mine's products will be entered into on acceptable terms or at all.

We may face operational risks associated with our ongoing restructuring and cost and operating efficiency initiatives.

We are continuing to implement initiatives relating to our strategic restructuring, including the reduction of mining low margin ore and the implementation of cost and operating efficiency initiatives. Any future combination of these measures to increase net asset value and improve profitability will be influenced by the actual benefits and savings achieved and by our ability to sustain these ongoing improvements. Strategic restructuring and cost cutting efforts may involve various risks, including, but not limited to, labour unrest and potential for strikes or road blockades.

We may have claims and lawsuits against us that may result in adverse outcomes.

We are, from time to time, involved in various claims, legal proceedings and complaints, including claims that purport to be class actions, arising in the ordinary course of business. As a result of the development of the business and our structure, we may also face historical claims. We cannot reasonably predict the likelihood or outcome of any such actions. If we are unable to resolve such disputes favourably, they may have a material adverse impact on our financial performance, cash flow and results of operations.

Adverse changes in legislation or in the relationship between us and our employees and contractors may have a material adverse effect on our business, results of operations and financial condition.

Production at our mining operations is dependent upon the efforts of our union and non-union employees and contractors. In addition, relations between us and our employees and contractors may be impacted by changes in the scheme of labour relations that may be introduced by the relevant governmental authorities in whose jurisdictions we carry on business or restructuring efforts that we may undertake from time to time. Adverse changes in legislation or in the relationship between us and our unionized employees and non-unionized employees and contractors, may have a material adverse effect on our business, results of operations and financial condition.

Any defects in the title to the properties we own could have a material and adverse effect on our cash flow, results of operations and financial condition.

Title insurance generally is not available for our properties, and our ability to ensure that we have obtained a secure claim to individual mineral properties or mining concessions may be severely constrained. We have not conducted surveys of all of the claims in which we hold direct or indirect interests and, therefore, the precise area and location of such claims may be in doubt. We can provide no assurances that there are no title defects affecting our properties. Accordingly, our mineral properties may be subject to prior unregistered liens, agreements, transfers or claims, including indigenous land claims, and title may be affected by, among other things, undetected defects. In addition, we may be unable to operate our properties as permitted or to enforce our rights with respect to our properties.

Activist shareholders could advocate for changes to our corporate governance and operational practices which could have an adverse effect on our reputation, business and future operations.

In recent years, publicly-traded companies have been increasingly subject to demands from activist shareholders advocating for changes to corporate governance practices, such as executive compensation practices, social issues, or for certain corporate actions or reorganizations. There can be no assurances that activist shareholders will not publicly advocate for us to make certain corporate governance changes or engage in certain corporate actions. Responding to challenges from activist shareholders, such as proxy contests, media campaigns or other activities, could be costly and time consuming and could have an adverse effect on our reputation and divert the attention and resources of our management and Board, which could have an adverse effect on our business and results of operations. Even if we do undertake such corporate governance changes or corporate actions, activist shareholders may continue to promote or attempt to effect further changes, and may attempt to acquire control of us to implement such changes. If shareholder activists seeking to increase short-term shareholder value are elected to the Board, this could adversely effect our business and future operations. Additionally, shareholder activism could create uncertainty about our future strategic direction,

resulting in loss of future business opportunities, which could adversely effect our business, future operations, profitability and our ability to attract and retain qualified personnel.

Market fluctuations could adversely affect the market price of our investments and the value we could realize on such investments.

Our investments in securities of other public companies are subject to volatility in the share prices of such companies. We cannot provide any assurance that an active trading market for any of the subject shares is sustainable. The trading prices of the subject shares could be subject to wide fluctuations in response to various factors beyond our control, including, quarterly variations in the subject companies' results of operations, changes in earnings (if any), estimates by analysts, conditions in the industry of such companies and macroeconomic developments in North America and globally, currency fluctuations and market perceptions of the attractiveness of particular industries. The lack of a liquid market could adversely affect the value that we could ultimately realize on such investments.

Not all losses are adequately covered by insurance and such losses may cause us to incur significant costs that could have a material adverse effect upon our financial performance and results of operations.

Our business is subject to a number of risks and hazards generally, including adverse environmental conditions, industrial accidents, labour disputes, protests and roadblocks, unusual or unexpected geological conditions, ground or stope instabilities or failures, cave-ins, mechanical failures, changes in the regulatory environment and natural phenomena such as inclement weather conditions, fires, floods, hurricanes and earthquakes. Such occurrences could result in damage to mineral properties or production facilities, personal injury or death, environmental damage to our properties or the properties of others, delays in mining, monetary losses and possible legal liability.

The insurance maintained by us to protect against risks will not cover all the potential risks associated with a mining company's operations. We may also be unable to maintain insurance to cover these risks at economically feasible premiums. Insurance coverage may not continue to be available or may not be adequate to cover any resulting liability. Moreover, insurance against risks such as attacks on our IT systems, loss of title to mineral property, environmental pollution, or other hazards as a result of exploration and production is not generally available to us or to other companies in the mining industry on acceptable terms. Uninsured losses could have an adverse effect on our cash flows, results of operations and financial condition.

The market price of our securities can be volatile and expose us to the risk of litigation.

Our Common Shares are listed on the TSX and NYSE. Securities of mining companies have experienced substantial volatility in the past, often based on factors unrelated to the financial performance or prospects of the companies involved. These factors include macroeconomic developments in North America and globally, currency fluctuations and market perceptions of the attractiveness of particular industries. The price of our Common Shares is also likely to be significantly affected by short-term changes in gold, silver, zinc, copper and lead prices or in our financial condition or results of operations as reflected in our quarterly earnings reports.

As a result of any of these factors, the market price of our Common Shares at any given point in time may not accurately reflect their long-term value. Securities class action litigation often has been brought against companies following periods of volatility in the market price of their securities. We have been and may in the future be the target of similar litigation. Securities litigation could result in substantial costs and damages and divert management's attention and resources.

In addition, if the pending Proposed Transaction and plan of arrangement is not completed, the market value of our Common Shares could decline.

Certain of our directors and officers also serve as directors and/or officers of other companies involved in natural resource exploration and development and consequently there exists the possibility for these directors and officers to be in a position of conflict.

Certain of our officers and directors may have pre-existing fiduciary and contractual obligations to other companies, including companies that are engaged in business activities similar to those intended to be conducted by us. Accordingly, they may participate in transactions and have obligations that may be in conflict or in competition with our business or acquisition strategy. As a result of such conflict, we may be required to forego the opportunity to participate in certain transactions. Any decision made by any of these directors and officers involving Goldcorp will be made in accordance with their duties and obligations to deal fairly and in good faith with a view to the best interests of Goldcorp and our shareholders.

Risk Factors Related to the Proposed Transaction:

Completion of the Proposed Transaction and plan of arrangement is uncertain, we have dedicated significant resources to pursuing the plan of arrangement and we are restricted from taking specified actions while the Proposed Transaction and plan of arrangement is pending and failure to complete the plan of arrangement could negatively impact our business.

The Arrangement Agreement restricts us from taking specified actions until the plan of arrangement is completed without the consent of Newmont. These restrictions may prevent us from pursuing attractive business opportunities that may arise prior to the completion of the plan of arrangement. As completion of the plan of arrangement is dependent upon satisfaction of certain conditions, the completion of the plan of arrangement is uncertain. If the plan of arrangement is not completed for any reason, the dedication of our resources to the completion thereof and the restrictions that were imposed on us under the Arrangement Agreement may have an adverse effect on our current future operations, financial condition and prospects.

The Arrangement Agreement with Newmont may be terminated by us or Newmont in certain circumstances, which could result in significant costs and could negatively impact the market price of our common shares.

In addition to termination rights relating to the failure to satisfy the conditions of closing, each of Goldcorp and Newmont has the right, in certain circumstances, to terminate the Arrangement Agreement and the plan of arrangement. Accordingly, there is no certainty, nor can we provide any assurance, that the Arrangement Agreement will not be terminated by either Goldcorp or Newmont before the completion of the plan of arrangement. Failure to complete the plan of arrangement could negatively impact the trading price of our common shares or otherwise adversely affect our business.

Either Goldcorp or Newmont may elect to not proceed with the pending Proposed Transaction if it is not consummated by July 31, 2019.

Either Goldcorp or Newmont may terminate the Arrangement Agreement if the plan of arrangement has not been completed by July 31, 2019 (subject to extension to obtain certain key regulatory approvals) and we and Newmont do not mutually agree to extend the outside date in the Arrangement Agreement.

We may be required to pay a Termination Fee to Newmont.

If the plan of arrangement is not completed as a result of certain prescribed events, we may be required to pay a termination fee of US\$350 million to Newmont in connection with the termination of the Arrangement Agreement. If such termination fee is ultimately required to be paid by us to Newmont, such payment may have an adverse impact on our financial results.

Newmont and Goldcorp may be the targets of legal claims, securities class actions, derivative lawsuits and other claims. Any such claims may delay or prevent the arrangement from being completed.

We and Newmont may be the target of securities class actions and derivative lawsuits which could result in substantial costs and may delay or prevent the plan of arrangement from being completed. Securities class action lawsuits and derivative lawsuits are often brought against companies that have entered into an agreement to acquire a public company or to be acquired. Third parties may also attempt to bring claims against us and Newmont seeking to restrain the plan of arrangement or seeking monetary compensation or other remedies. Even if the lawsuits are without merit, defending against these claims can result in substantial costs and divert management time and resources. Additionally, if a plaintiff is successful in obtaining an injunction prohibiting consummation of the arrangement, then that injunction may delay or prevent the plan of arrangement from being completed.

In addition, political and public attitudes towards the plan of arrangement could result in negative press coverage and other adverse public statements affecting us. Adverse press coverage and other adverse statements could lead to investigations by regulators, legislators and law enforcement officials or in legal claims or otherwise negatively impact the ability of the combined company to take advantage of various business and market opportunities. The direct and indirect effects of negative publicity, and the demands of responding to and addressing it, may have a material adverse effect on our business, financial condition and results of operations.

We will incur substantial transaction fees and costs in connection with the proposed plan of arrangement. If the plan of arrangement is not completed, the costs may be significant and could have an adverse effect on Goldcorp.

We have incurred and expect to incur additional material non-recurring expenses in connection with the plan of arrangement and completion of the transactions contemplated by the Arrangement Agreement, including costs relating to obtaining required shareholder and regulatory approvals. Additional unanticipated costs may be incurred by the combined company in the course of coordinating the businesses of the combined company after completion of the plan of arrangement. If the plan of arrangement is not completed, we will need to pay certain costs relating to the plan of arrangement incurred prior to the date the arrangement was abandoned, such as legal, accounting, financial advisory, proxy solicitation and printing fees. Such costs may be significant and could have an adverse effect on our future results of operations, cash flows and financial condition.

The pending Proposed Transaction and plan of arrangement may divert the attention of our management, and any such diversion could have an adverse effect on our business.

The pending Proposed Transaction and plan of arrangement could cause the attention of our management to be diverted from our day-to-day operations. These disruptions could be exacerbated by a delay in the completion of the plan of arrangement and could result in lost opportunities or negative impacts on performance, which could have a material and adverse effect on our business, financial condition and results of operations or prospects if the pending Proposed Transaction and plan of arrangement is not completed.

DIVIDENDS

Our current policy is to pay a quarterly dividend on our Common Shares and on March 1, 2019, we declared a quarterly dividend of \$0.02 per Common Share, payable on March 22, 2019.

In each of 2017 and 2018, the dividend paid was \$0.08 per Common Share (quarterly payments of \$0.02 per Common Share). In 2016, the dividend paid was \$0.12 per Common Share (monthly payments of \$0.02 per Common Share until March 2016, and thereafter quarterly payments of \$0.02 per Common Share).

Although we expect to continue paying a cash dividend, future dividends will be at the discretion of the Board and will be subject to factors such as our cash flow, results of operations and financial condition of Goldcorp and our subsidiaries, the need for funds to finance ongoing operations, compliance with credit agreements and other instruments, and such other considerations as the Board considers relevant.

DESCRIPTION OF CAPITAL STRUCTURE

Our authorized share capital consists of an unlimited number of Common Shares. As of December 31, 2018 and March 27, 2019, 867,530,509 Common Shares and 869,316,763 Common Shares were issued and outstanding, respectively. Holders of Common Shares are entitled to receive notice of any meetings of our shareholders, to attend and to cast one vote per Common Share at all such meetings. Holders of Common Shares do not have cumulative voting rights with respect to the election of directors and, accordingly, holders of a majority of the Common Shares entitled to vote in any election of directors may elect all directors standing for election. Holders of Common Shares are entitled to receive on a pro-rata basis such dividends, if any, as and when declared by the Board at its discretion from funds legally available therefor and upon the liquidation, dissolution or winding up of Goldcorp are entitled to receive on a pro-rata basis the net assets of Goldcorp after payment of debts and other liabilities, in each case subject to the rights, privileges, restrictions and conditions attaching to any other series or class of shares ranking senior in priority to or on a pro-rata basis with the holders of Common Shares with respect to dividends or liquidation. The Common Shares do not carry any pre-emptive, subscription, redemption or conversion rights, nor do they contain any sinking or purchase fund provisions.

INDEBTEDNESS

We have a \$3.0 billion Credit Facility with a term expiring on June 30, 2023 and as at December 31, 2018 \$2.52 billion was available under the Credit Facility.

As of December 31, 2018, we had aggregate consolidated indebtedness of approximately \$2.88 billion, consisting of, approximately \$0.48 billion outstanding under the Credit Facility, approximately \$0.40 billion term loan due March 14, 2019 (which has been replaced with a term loan credit agreement dated March 11, 2019 for the same amount), approximately \$0.55 billion aggregate principal amount of 3.625% notes due June 9, 2021, approximately \$1.0 billion aggregate principal amount of 3.70% notes due March 15, 2023 and approximately \$0.45 billion aggregate principal amount of 5.45% notes due June 9, 2044.

The notes are governed by an indenture dated as of March 20, 2013, between us and Wells Fargo Bank, National Association, as trustee, as supplemented by a first supplemental indenture dated March 20, 2013 and a second supplemental indenture dated June 9, 2014. The notes are unsecured and interest is payable semi-annually in arrears. The notes are callable at anytime by us prior to maturity, subject to make-whole provisions.

In addition, we have letters of credit outstanding that support our various operations in an aggregate amount of approximately \$419 million (including the approximately \$323 million in reclamation financial assurance for mine closure obligations).

Ratings

The following table sets out our corporate and debt ratings by the rating agencies indicated as at March 27, 2019:

Standard & Poor's Ratings Services	Moody's Investors Service	Fitch Ratings Ltd.
BBB+	Baa3	BBB
Credit Watch Negative	Under Review for Upgrade	Rating Watch Positive

Standard & Poor's Ratings Services ("**S&P**") credit ratings are on a rating scale that ranges from AAA to D, which represents the range from highest to lowest quality. Ratings AAA to BBB- are considered investment grade, and BB+ to D are considered speculative grade. The ratings from AA to CCC may be modified by the addition of a plus (+) or minus (-) sign to show relative standing within the major rating categories. According to the S&P, an obligor rated BBB has adequate capacity to meet its financial commitments. However, adverse economic conditions or changing circumstances are more likely to weaken the obligor's capacity to meet its financial commitments. CreditWatch highlights S&P's opinion regarding the potential direction of a rating. It focuses on identifiable events and short-term trends that cause ratings to be placed under special surveillance. Ratings may be placed on CreditWatch when an event has occurred or, in S&P's view, a deviation from an expected trend has occurred or is expected and when additional information is necessary to evaluate the current rating. Events and short-term trends may include mergers, recapitalizations, voter referendums, regulatory actions, performance deterioration of securitized assets, or anticipated operating developments. A CreditWatch listing, however, does not mean a rating change is inevitable, and when appropriate, a range of potential alternative ratings will be shown. CreditWatch is not intended to include all ratings under review, and rating changes may occur without the ratings having first appeared on CreditWatch. The "positive" designation means that a rating may be raised; "negative" means a rating may be lowered; and "developing" means that a rating may be raised, lowered, or affirmed.

Moody's Investors Service ("**Moody's**") credit ratings are on a rating scale that ranges from Aaa to C, which represents the range from highest to lowest quality. Moody's appends numerical modifiers 1, 2 and 3 to each generic rating classification from Aa through Caa. The modifier 1 indicates that the obligation ranks in the higher end of its generic rating category; the modifier 2 indicates a mid-range ranking; and the modifier 3 indicates a ranking in the lower end of that generic category. According to Moody's, a rating of Baa is an investment grade rating. Obligations rated Baa are judged to be medium-grade and subject to moderate credit risk and as such may possess certain speculative characteristics. A review (a "**Review**") indicates that a rating is under consideration for a change in the near term. A rating can be placed on Review for upgrade, downgrade, or more rarely with direction uncertain. A Review may end with a rating being upgraded, downgraded, or confirmed without a change to the rating. Ratings on Review are said to be on Moody's "Watchlist" or "On Watch". Ratings are placed on Review when a rating action may be warranted in the near term but further information or analysis is needed to reach a decision on the need for a rating change or the magnitude of the potential change. The time between the origination of a rating Review and its conclusion varies widely depending on the reason for the Review and the amount of time needed to obtain and analyze the information relevant to make a rating determination. In some cases, the ability to conclude a Review is dependent on whether a specific event occurs, such as the completion of a corporate merger or the execution of an amendment to a structured finance security.

Fitch Ratings Ltd. ("**Fitch Ratings**") credit ratings are on a rating scale that ranges from AAA to D, which represents the range from highest to lowest quality. The terms "investment grade" and "speculative grade" have established themselves over time as shorthand to describe the categories AAA to BBB (investment grade) and BB to D (speculative grade). The ratings from AA to B may be modified by the addition of a plus (+) or minus (-) sign to show relative status within the major rating categories. According to Fitch Ratings' system, BBB ratings indicate good credit quality and that the expectations of default risk are currently low. The capacity for payment of financial commitments is considered adequate, but adverse business or economic conditions are more likely to impair this capacity. Rating Watches

indicate that there is a heightened probability of a rating change and the likely direction of such a change, and those designated as "Positive" indicate that a rating could stay at its present level or potentially be upgraded. A Rating Watch is typically event-driven, and as such, it is generally resolved over a relatively short period. The event driving the Watch may be either anticipated or have already occurred, but in both cases, the exact rating implications remain undetermined. The Watch period is typically used to gather further information and/or subject the information to further analysis.

We understand that the ratings are based on, among other things, information furnished by us to the above ratings agencies and information obtained by the ratings agencies from publicly available sources. The credit ratings given to our corporate debt by the rating agencies are not recommendations to buy, hold or sell debt instruments since such ratings do not comment as to market price or suitability for a particular investor. There is no assurance that any rating will remain in effect for any given period of time or that any rating will not be revised or withdrawn entirely by a rating agency in the future if, in its judgment, circumstances so warrant. Credit ratings are intended to provide investors with (i) an independent measure of the credit quality of an issue of securities; (ii) an indication of the likelihood of repayment for an issue of securities; and (iii) an indication of the capacity and willingness of the issuer to meet its financial obligations in accordance with the terms of those securities. Credit ratings accorded to our corporate debt may not reflect the potential impact of all risks on the value of debt instruments, including risks related to market or other factors discussed in this annual information form. See also "Risk Factors - Our indebtedness could adversely affect our business, financial condition and results of operations and our ability to meet our payment obligations under our indebtedness".

We have made payments to S&P, Moody's and Fitch Ratings in connection with the confirmation of ratings assigned to our long-term debt.

MARKET FOR SECURITIES

Our Common Shares are listed and posted for trading under the symbol "G" on the TSX and on the NYSE under the symbol "GG". The following table sets forth information relating to the trading of the Common Shares on the TSX for the months indicated.

Month	High (C\$)	Low (C\$)	Volume
January 2018	19.18	16.06	106,004,204
February 2018	17.62	15.04	96,723,946
March 2018	18.02	15.60	82,944,789
April 2018	18.36	16.95	73,957,211
May 2018	18.56	16.77	64,616,044
June 2018	18.70	17.49	61,639,099
July 2018	18.51	16.11	54,884,669
August 2018	16.23	13.60	87,352,791
September 2018	14.14	12.97	90,624,498
October 2018	14.53	10.98	166,509,154
November 2018	13.10	11.69	101,759,895
December 2018	13.45	12.12	110,450,657

The closing price of the Common Shares on the TSX on March 27, 2019 was C\$15.32.

DIRECTORS AND OFFICERS

Directors

The following is a brief biography of each of our directors.

Ian W. Telfer – Chairman of the Board and Director. Mr. Telfer, of British Columbia, Canada, is the Chairman of the Board and a director of Goldcorp. Mr. Telfer has served as the Chairman of the Board since November 15, 2006 and served as Chairman of the World Gold Council from December 2009 to June 2013. Prior thereto, he was President and Chief Executive Officer of Goldcorp since March 17, 2005 and Chairman and Chief Executive Officer of Wheaton River Minerals Ltd. prior to such time since September 2001. Mr. Telfer became a director of Goldcorp in February 2005. Mr. Telfer has over 30 years of experience in the precious metals business. He is co-founder and director of Renaissance Oil Corp. and has served as a director and/or officer of several Canadian and international companies. Mr. Telfer is a Fellow in the Institute of Chartered Accountants. He holds a Bachelor of Arts from the University of Toronto, a Masters of Business Administration from the University of Ottawa and was awarded an honorary doctorate from the University of Ottawa in 2015. Mr. Telfer's extensive experience in the mining industry provides a direct benefit to both the functionality of the Board and to our shareholders. Mr. Telfer was inducted into the Canadian Mining Hall of Fame in 2015 and is a member of the National Association of Corporate Directors ("**NACD**") and Institute of Corporate Directors ("**ICD**").

Beverley A. Briscoe – Vice Chair of the Board and Lead Director. Ms. Briscoe, of British Columbia, Canada, is an independent director of Goldcorp and the Vice-Chair and Lead Director of the Board, a position she has held since April 28, 2016. Ms. Briscoe became a director of Goldcorp in April 2006. In addition to her role at Goldcorp, Ms. Briscoe is the Chair of the Board of Ritchie Bros. Auctioneers Incorporated. She has extensive industry experience in the transportation and industrial equipment sector, including owning a transportation services company from 1997 to 2004. She is the past Chair of the Industry Training Authority for BC (2003 to 2007), past Chair of the BC Forest Safety Council (2008 to 2009), past Chair of the Audit Committee for the Office of the Superintendents of Financial Institutions and a past member of the Government of Canada's Advisory Council for Promoting Women on Boards. She is a Fellow of the Institute of Chartered Accountants, a Fellow of the ICD in Canada and holds a Bachelor of Commerce from the University of British Columbia. Ms. Briscoe brings an important range of extensive and diverse financial, accounting and business experience to the Board. Ms. Briscoe is a member of the NACD and ICD.

David Garofalo – Director, President and Chief Executive Officer. Mr. Garofalo, of British Columbia, Canada, is our President and Chief Executive Officer, a position he has held since February 29, 2016. Mr. Garofalo became a director of Goldcorp on April 28, 2016. Previously, Mr. Garofalo served as President and Chief Executive Officer and Director of Hudbay Minerals Inc. from July 2010 to December 2015. Prior thereto, Mr. Garofalo had served as Senior Vice President, Finance and Chief Financial Officer with Agnico Eagle Mines Limited since 2006. In addition, Mr. Garofalo has also served as a director of Colossus Minerals Inc. ("**Colossus**") (2012 to 2013), Malbex Resources Inc. (2009 to 2012), Agnico-Eagle Mines Limited (2008–2010), Stornoway Diamond Corporation (2006 to 2010) and Tiberon Minerals Ltd. (2006 to 2007). Mr. Garofalo holds a Bachelor of Commerce (with Distinction) from the University of Toronto. Mr. Garofalo is a member of the NACD and ICD.

Cristina Bitar – Director. Mrs. Bitar, of Chile, is an independent director of Goldcorp. Mrs. Bitar became a director of Goldcorp on October 24, 2018. In addition to her role at Goldcorp, Mrs. Bitar is a senior partner at Azerta, one of the leading strategic communication and public affairs agencies in Chile and Peru where she executes on complex business crisis, regulatory matters and highly visible media and social issues for corporate clients. Mrs. Bitar previously founded one of the most dynamic and fastest growing communication firms in Chile, Captiva, which in 1999 merged with Hill & Knowlton. She was elected nine times as one of the 100 leading women in the Chile by El Mercurio, a leading Chilean newspaper, and Mujeres Empresarias, a women's business leadership organization. Mrs. Bitar was also awarded the Universidad del Pacifico's Women of the XXI Century recognition, granted to professional women for their contributions in different sectors. Mrs. Bitar holds a BA in Economics and Sociology from Dartmouth College and an MBA from the Universidad de Chile and Tulane University. She is currently a

board member of one of the largest private pension funds in Chile – AFP PProvida, a Metlife Company. Mrs. Bitar is a member of the NACD and ICD.

Matthew Coon Come, O.C. – Director. Mr. Coon Come, of Ontario Canada, is an independent director of Goldcorp. Mr. Coon Come became a director of Goldcorp on July 26, 2017. He is a national and international leader and an advocate of indigenous rights and the former Grand Chief of the Grand Council of the Cree and the former Chairperson of the Cree Regional Authority, positions he held for over 20 years. In 2018, Mr. Coon Come was appointed an Officer of the Order of Canada. He also served as National Chief of the Assembly of First Nations from 2000 to 2003. In recognition of his leadership in environmental stewardship, Mr. Coon Come was awarded the Goldman Prize in 1994, considered by many as the “Nobel Prize of Environmental Awards”. Mr. Coon Come studied political science, economics, native studies and courses in law at both Trent and McGill Universities. He also received honorary Doctor of Laws degrees from Trent University in 1998 and the University of Toronto in 2000, in recognition for his leadership and the significance of his work. He is currently a Director of Labrador Iron Mines Holdings Limited. Mr. Coon Come is a member of the NACD and ICD.

Margot Franssen, O.C. – Director. Ms. Franssen, of Ontario, Canada, is an independent director of Goldcorp. Ms. Franssen became a director of Goldcorp on April 30, 2015. Ms. Franssen is the founder and past-president of The Body Shop Canada. In 2002, Ms. Franssen was appointed an Officer of the Order of Canada, and she has received the Outstanding Achievement in the Advancement of Women Award from the United Nations Development Fund UNIFEM. She received an undergraduate degree from York University, is a fellow of Ryerson Polytechnic University, and has a honorary Doctor of Humane Letters 1995 and a honorary Doctor of Laws, Honoris Causa 1994. Ms. Franssen has served on numerous boards including CIBC, Women's College Hospital and York University. Ms. Franssen is dedicated to philanthropic endeavors, with a focus on the Advancement of Women and Girls and Human Rights issues. In 2016, she co-founded The Canadian Centre to End Human Trafficking of Canadian Girls. From 2012 to 2014, she acted as Co-Chair of the National Task Force on Sex Trafficking of Canadian Girls, and for six years prior served as Board Co-Chair of the Canadian Women's Foundation. In 2011, Ms. Franssen was a founding board member of Women Moving Millions, a global charitable organization committed to encouraging large-scale investments in initiatives that advance and empower women and girls worldwide. Ms. Franssen combines pragmatic business leadership with a unique perspective on the relationship between corporations and their various stakeholders and communities. Her diverse experience in business and social change positions her to provide valuable insight to the Board. Ms. Franssen is a member of the NACD and ICD.

Clement A. Pelletier – Director. Mr. Pelletier, of British Columbia, Canada, is an independent director of Goldcorp. Mr. Pelletier became a director of Goldcorp on May 1, 2014. Mr. Pelletier is a process chemist/metallurgist by training with 14 years in the mining industry and 35 years in resource-related mine/environmental consulting. Mr. Pelletier has managed the environmental engineering work for many projects for clients including: BHP Billiton Limited (“**BHP Billiton**”), Newmont, Vale S.A./Inco Limited, Glencore Xstrata Plc (formerly known as Xstrata Plc), Placer Dome /Barrick, Teck, Rio Tinto Borates (formerly known as U.S. Borax Inc.), a subsidiary of the Rio Tinto Group (“**Rio Tinto**”) and First Quantum Minerals Ltd. He has managed large environmental impact statement and permitting for major projects such as the KSM Project, the Jansen Potash Project, Goro Nickel, the Voisey's Bay Nickel Project, Escondida, the Ekati Diamond Mine and others. Since 1981 as founder and President of Rescan Group, Mr. Pelletier was involved in the evaluation and development of Deep Sea Tailings Placement systems in Europe, the Americas, Africa and Southeast Asia. Mr. Pelletier holds a Bachelor of Science in Chemistry/Metallurgy from the University of Saskatchewan and a Diploma from the Colorado School of Mines. He has served as a director of BioteQ Environmental Technologies Inc. since 2000. Mr. Pelletier is a Fellow of the CIM. Mr. Pelletier's extensive experience in the industry and environmental and technical expertise provides valuable insight and makes him a significant resource to both the Board and management. Mr. Pelletier is a member of the NACD and ICD.

P. Randy Reifel – Director. Mr. Reifel, of British Columbia, Canada, is an independent director of Goldcorp. Mr. Reifel became a director of Goldcorp on November 15, 2006. Mr. Reifel is President and a director of Chesapeake Gold Corp., a company that explores for precious metals in Mexico and Central America, and President and a director of Gunpoint Exploration Ltd. Prior to his appointment to the Board,

he had been a director of Glamis since June 2002 following the acquisition of Francisco Gold Corp. Mr. Reifel holds a Bachelor of Commerce and a Masters of Science in Business Administration from the University of British Columbia. Mr. Reifel's extensive experience in the mining industry, coupled with his background in precious metals exploration and project development, combine to provide valuable industry insight and perspective to both the Board and management. Mr. Reifel is a member of the NACD and ICD.

Charlie Sartain – Director. Mr. Sartain, of Brisbane, Australia, is an independent director of Goldcorp. Mr. Sartain became a director of Goldcorp on January 1, 2017. Mr. Sartain has over 30 years of experience in the mining industry as a professional mining engineer and corporate executive. Previously, he was the Chief Executive Officer of Xstrata Plc's global copper business and under his nine-year tenure grew the business to become one of the world's leading copper producers with mining operations and projects spanning seven countries. Prior to that, Mr. Sartain had extensive operating and executive experience with MIM Holdings Ltd., including General Manager at Ravenswood Gold Mines and General Manager at Ernest Henry Mine in Queensland Australia, President of Minera Alumbrera Ltd. in Argentina and Executive General Manager for Latin America. He is an independent non-executive director of ASX-listed companies ALS Limited and OZ Minerals Limited. He is also a director and Chairman of the Advisory Board of the Sustainable Minerals Institute at the University of Queensland, and a director of the Wesley Medical Research Institute. Mr. Sartain holds a Bachelor of Engineering degree with Honours from the University of Melbourne, Australia. Mr. Sartain is a Fellow of the Australian Institute of Mining and Metallurgy (FAusIMM), and a Fellow of the Australian Academy of Technological Sciences and Engineering (FTSE). Mr. Sartain is a member of the NACD and ICD.

Kenneth F. Williamson – Director. Mr. Williamson, of Ontario, Canada, is an independent director of Goldcorp. Mr. Williamson became a director of Goldcorp on November 15, 2006. Prior thereto, he had been a director of Glamis since 1999. He was Vice-Chairman, Investment Banking at Midland Walwyn/Merrill Lynch Canada Inc. from 1993 to 1998. He has worked in the securities industry for more than 25 years, concentrating on financial services and the natural resource industries in the United States and Europe. He holds a Bachelor of Applied Science (P.Eng.) from the University of Toronto and a Masters of Business Administration from the University of Western Ontario. Mr. Williamson's experience in the investment banking and natural resources industries, in both domestic and international markets, combined with his knowledge of commodities and securities markets, provides the Board with valuable insight and perspective on these issues. In addition, Mr. Williamson brings valuable financial expertise and understanding to the Board. Mr. Williamson is a member of the NACD and ICD.

Directors are elected at each annual meeting of our shareholders and serve as such until the next annual meeting or until their successors are elected or appointed.

Committees

The members of the Audit Committee are Beverly A. Briscoe (Chair), Clement Pelletier, and Kenneth Williamson. Blanca Treviño was a member of the Audit Committee until her retirement from our Board on April 26, 2018.

The members of the Human Resources and Compensation Committee are Kenneth Williamson (Chair), Margot A. Franssen, P. Randy Reifel and Charlie Sartain.

The members of the Governance and Nominating Committee are Randy Reifel (Chair), Clement A. Pelletier, Cristina Bitar⁴ and Beverly A. Briscoe. Blanca Treviño was a member of the Governance and Nominating Committee until her retirement from our Board on April 26, 2018.

The members of the Sustainability Committee are Clement Pelletier (Chair), Matthew Coon Come, Margot A. Franssen, P. Randy Reifel and Charlie Sartain.

⁴ Ms. Bitar was appointed to the Governance and Nominating Committee effective October 24, 2018.

Officers

The following is a brief biography of each of our officers.

David Garofalo – Director, President and Chief Executive Officer. See biography under “Directors” above.

Jason Attew – Executive Vice President, Chief Financial Officer and Corporate Development. Mr. Attew, of British Columbia, is our Executive Vice President, Chief Financial Officer and Corporate Development, a position he has held since October 26, 2017. Mr. Attew had been our Senior Vice President, Corporate Development and Strategy since August 15, 2016. Mr. Attew is a mining and metals banking executive with over 20 years of experience encompassing project management, corporate finance and investment banking. Mr. Attew has advised on over \$20 billion of corporate transactions, raised over \$17 billion in growth capital via equity and debt capital markets, and led \$6 billion in equity/equity linked financings. Mr. Attew began his career as a Project Manager for a geological exploration company before embarking on a finance career in 2001. Most recently, he was a Managing Director of BMO's Global Metals & Mining team. Mr. Attew holds a Bachelor of Science from the University of British Columbia, as well as a Masters of Business Administration from Queen's University.

Todd White – Executive Vice President and Chief Operating Officer. Mr. White, of Washington, United States, is our Executive Vice President and Chief Operating Officer, a position he has held since January 1, 2017. Mr. White had been our Senior Vice President, Technical Services and Business Excellence since July 30, 2014. Prior to joining us, Mr. White held the position of Senior Vice President for South American operations for Newmont. Over his 21 years with Newmont, Mr. White held various leadership roles within the areas of business excellence, operations, and environment. His prior work experience at Newmont has taken him to Indonesia, Australia, Peru, Bolivia, and the United States. Mr. White holds a Bachelor of Science from the University of Nevada.

Brent Bergeron – Executive Vice President, Corporate Affairs and Sustainability. Mr. Bergeron, of British Columbia, Canada, is our Executive Vice President, Corporate Affairs and Sustainability, a position he has held since January 12, 2015. From September 2012 to January 2015 he served as our Senior Vice President, Corporate Affairs and prior to that as our Vice President, Corporate Affairs from December 2010 to September 2012. Mr. Bergeron has 20 years of international and government relations experience in many sectors such as government software, broadcasting, telecommunications and utilities. Prior to joining us, Mr. Bergeron held progressively senior positions at various companies in Canada and Mexico where he was responsible for government relations and business development activities in Latin America, Africa, Europe and Asia. Mr. Bergeron holds a Bachelor of Arts (Economics) and Master of Arts (Economics) from Carleton University.

Charlene Ripley – Executive Vice President, General Counsel. Ms. Ripley, of British Columbia, Canada, is our Executive Vice President, General Counsel, a position she has held since April 1, 2013. Ms. Ripley leads our Legal, Ethics and Compliance and People teams, as well as risk functions including Internal Audit, Enterprise Risk Management and Insurance. Prior to joining us, Ms. Ripley served as Senior Vice President & General Counsel at Linn Energy, LLC in Houston. Ms. Ripley holds a Bachelor of Arts, with distinction, from the University of Alberta and earned her Bachelor of Laws from Dalhousie University in Halifax, Nova Scotia. She is a member of The Law Society of British Columbia, The Law Society of Alberta and the Texas State Bar.

Joseph Dick – Senior Vice President, Mine Optimization. Mr. Dick, of Mexico City, Mexico, is our Senior Vice President, Mine Optimization, a position he has held since March 1, 2018. From March 2015 to February 28, 2018, he served as Senior Vice President, Latin America, and from June 2014 to March 2015, served as the Chief Operating Officer for Goldcorp Mexico. Mr. Dick has over 34 years of experience in the mining sector, including operations, maintenance, engineering, supply chain and sustainability roles in both surface and underground environments. Prior to joining us, he led the transition of the Pueblo Viejo Mine, from construction through to full production, as Pueblo Viejo General Manager from April 2011 to June 2014. Also in his 10 years with Barrick, he led the start-up of the Cortez Hills open pit and underground mines as General Manager of the combined Cortez Mines from January 2008

to March 2011. Mr. Dick has also served in numerous other leadership, managerial and support roles over his career. Mr. Dick received a Bachelor of Science in Mining Engineering from Montana Tech of the University of Montana.

Paul Harbidge – Senior Vice President, Exploration. Mr. Harbidge, of British Columbia, Canada, is our Senior Vice President, Exploration, a position he has held since August 1, 2016. Mr. Harbidge brings over 20 years of mining experience to us, most recently as head of exploration at Randgold Resources Limited. Mr. Harbidge is responsible for the development, implementation and management of the global exploration function within our decentralized model. He holds a Bachelor of Science in Geology from Kingston University in the UK, as well as a Master of Science in Mineral Exploration and Mining Geology from Leicester University in the UK.

Patrick Merrin – Senior Vice President, Canada Operations. Mr. Merrin, of British Columbia, Canada, is our Senior Vice President, Canada Operations, a position he has held since February 14, 2018. Mr. Merrin joined us as Vice President, Canada Operations on September 11, 2017. Prior to joining us, he held the position of Vice President of the Arizona Business unit with Hudbay Minerals Inc. from July 2014 until September 2017 and Vice President, Business Development and Technical Services from July 2012 until July 2014. Prior thereto, Mr. Merrin held various executive and management positions with Adex Mining Inc., Xstrata Nickel, and Lucas Milhaupt, a division of Handy & Harman Ltd. Mr. Merrin holds a Bachelor in Chemical Engineering from McGill University and a Masters of Business Administration from the University of Toronto. He has been a member of the Professional Engineers of Ontario since 1997.

Ivan Mullany – Senior Vice President, Technical Services. Mr. Mullany, of Ontario, Canada, is our Senior Vice President, Technical Services, a position he has held since September 18, 2017. Mr. Mullany is a senior executive with extensive leadership strengths in project development, operations, technical excellence, innovation, strategic planning and execution, gained over a 30-year career in the mining sector. He has held a series of progressively senior positions in both production and projects at various major mining companies, including Rio Tinto and Barrick. Prior to joining us, Mr. Mullany held senior leadership roles with Hatch Ltd. and Barrick. Mr. Mullany spent 12 years at Barrick where he was the Senior Vice President, Capital Projects. He holds a Bachelor of Science in Extractive Metallurgy from Murdoch University. Mr. Mullany is a Fellow at the Australian Institute of Mining and Metallurgy (FAusIMM).

Richard Oraziatti – Senior Vice President, Treasurer. Mr. Oraziatti, of British Columbia, Canada, is our Senior Vice President, Treasurer, a position he has held since November 1, 2017. Mr. Oraziatti, had been our Senior Vice President, Controller since March 9, 2016 and prior to that the Vice President, Internal Audit since February 2012. Prior to joining us, Mr. Oraziatti was Vice President of Finance at BCE Inc. where he led the financial management of various operating divisions. He brings us extensive experience in finance and accounting, risk and assurance, operational management, strategic planning, corporate development and change management. Mr. Oraziatti is a Chartered Professional Accountant in British Columbia and holds a Bachelor of Business Administration from Simon Fraser University. He is currently completing a Global Executive MBA at IESE Business School of the University of Navarra.

Rohan Athaide – Vice President, Risk Management & Assurance. Mr. Athaide, of British Columbia, Canada, is our Vice President, Risk Management & Assurance, a position he has held since March 2017. Mr. Athaide had been our Vice President, Internal Audit since March 9, 2016. Mr. Athaide joined us on January 30, 2012 and has held increasingly senior leadership positions. Prior to joining us, Mr. Athaide held leadership roles in the Advisory Services practice of Ernst & Young, during which he led internal audit and internal controls over financial reporting services for several multi-national corporations, while also providing consulting services in risk management, process improvement, and change management. Mr. Athaide has certifications in internal audit and risk management, and holds an Honours Bachelor of Arts specializing in economics from the University of Toronto.

Peter Calnan – Vice President, Safety and Health. Mr. Calnan, of Ontario, Canada, is our Vice President, Safety and Health, a position he has held since, December 8, 2017. Mr. Calnan had been acting as our Global Head of Health and Safety since June 1, 2017 and prior thereto was the Director of Health, Safety and Change Management for the Canada/US Region since September 1, 2015. Prior to

joining us, Mr. Calnan worked at Barrick, the Ontario Ministry of Labour and Newmont, where he held various positions in Health and Safety, and as an inspector for the Ministry in Ontario. He has been working in the mining industry since 1981. Mr. Calnan holds a designation as a Canadian Registered Safety Professional.

Luis Canepari – Vice President, Technology. Mr. Canepari, of British Columbia, Canada, is our Vice President, Technology, a position he has held since April 26, 2017. Mr. Canepari had served as our Director, Information Technology Applications since November 2012. As Vice President, Information Technology, Mr. Canepari leads the global information technology organization and is responsible for driving and overseeing enterprise-wide plans to further realize value from our strategic business and technology investments, particularly leveraging SAP as our strategic platform. Prior to joining us, Mr. Canepari held the position of Director of Engineering and Construction in AES Corporation based in Arlington, Virginia. Mr. Canepari holds a Masters of Business Administration from Georgetown University, Washington, DC and a Bachelor of Science with a major in Systems Engineering from Universidad Metropolitana, Caracas, Venezuela. He is also a Certified Information Security Manager and a Certified Information Security Auditor.

Randall Chatwin – Vice President, Assistant General Counsel. Mr. Chatwin, of British Columbia, Canada, is our Vice President, Assistant General Counsel, a position he has held since February 15, 2017. Mr. Chatwin had been our Assistant General Counsel since May 2015. Prior to joining us, he spent 11 years in private practice at the law firm of Lawson Lundell LLP practicing corporate commercial law with a specific focus on corporate finance and mergers and acquisitions in the mining industry. Mr. Chatwin holds a Bachelor of Arts from the University of Victoria and Juris Doctor from the University of Saskatchewan.

Jenine Ellefson – Vice President, People. Ms. Ellefson, of British Columbia, Canada, is our Vice President, People, a position she has held since July 25, 2018. Ms. Ellefson joined us on January 9, 2012 and has held increasingly senior leadership positions in the Human Resources function. Prior to joining us, Ms. Ellefson worked for several major mining companies including Barrick, BHP Billiton and Placer Dome in various corporate and site-based roles in both Canada and Australia. She brings extensive experience in Human Resources, including strategy development, executive compensation, strategic resourcing, organizational development, HR system implementation, project management, union negotiation, and talent management. Ms. Ellefson holds a Bachelor of Commerce degree in Human Resources Management from the University of British Columbia.

Rishi Ghuldu – Vice President, Business Transformation. Mr. Ghuldu, of British Columbia Canada, is our Vice President, Business Transformation, a position he has held since July 25, 2018. Previously he was Vice President for our Operational Excellence and Supply Chain functions. Mr. Ghuldu joined us in July 2013 as Director, Operational Excellence. Prior to joining us, he spent nine years at Barrick, taking on a series of progressive positions and responsibilities, which included Business Improvement, Supply Chain and Mergers and Acquisitions. He began his career in the automotive industry, involved with operations management and new plant designs. Mr. Ghuldu holds a Bachelor of Technology in Manufacturing Engineering from McMaster University and an executive Masters of Business Administration from the Kellogg-Schulich School of Business, at Northwestern and York University.

Jack Henris – Vice President, Mining and Geotechnical. Mr. Henris, of Colorado, United States, is our Vice President, Mining, a position he has held since January 8, 2018. Mr. Henris has over 32 years of experience in the mining industry. He has held senior positions at Newmont including General Manager at Carlin and Cripple Creek and Victor, Mine Manager for Carlin Surface Operations and Leeville Underground Operations and Chief Engineer for Carlin Surface Operations. Mr. Henris holds a Bachelor of Engineering (Geological) from South Dakota School of Mines and Technology.

Simon Hille – Vice President, Global Innovation, Metallurgy & Processing. Mr. Hille, of British Columbia, Canada, is our Vice President, Global Innovation, Metallurgy & Processing, a position he has held since February 14, 2018. Mr. Hille had been our Vice President, Technical Services since January 1, 2014. Mr. Hille had been our Director, Metallurgy since 2012. Mr. Hille is an extractive metallurgist with extensive experience in senior technical positions in the mining industry, with a proven track record in

developing new technologies. He has held a series of progressively senior positions in both production and corporate levels at various major mining companies, including Barrick, Newcrest Mining Limited, Western Mining Corporation and Placer Dome. Prior to joining us, Mr. Hille spent five years as the Senior Manager Metallurgy and Process for Barrick in Toronto. He holds a Bachelor of Science in Extractive Metallurgy from the Western Australian School of Mines.

Joanne Klein – Vice President, Supply Chain. Ms. Klein, of British Columbia, Canada, is our Vice President, Supply Chain, a position she has held July 25, 2018. Previously, Ms. Klein had been our Vice President, People, from 2014 and our Director, Compensation from May 2011. Prior to joining us, Ms. Klein held the position of Director, Compensation Strategy and Design at TELUS Corporation from April 2008 to February 2011. Ms. Klein started her career with Deloitte LLP in their International Assignments Tax practice in London, England where she successfully achieved her Association of Tax Technicians qualification. Ms. Klein holds a Bachelor of Arts in Accountancy (Honours) from Glasgow Caledonian University.

Sean McCarthy – Vice President, Business Planning. Mr. McCarthy, of British Columbia, Canada, is our Vice President, Business Planning, a position he has held since March 19, 2018. Mr. McCarthy joined us in 2014 as Business Director, Mexico Studies and assumed the role of Director, Capital Allocation in June 2016 before transitioning to the role of Director, Business Planning in October 2016. Prior to joining us, he worked for over ten years at Newmont, holding several senior roles in the area of financial planning and analysis, most recently as Director of Business Planning. Mr. McCarthy holds a Bachelor of Arts in Economics from the College of William & Mary in Virginia and a Masters of Business Administration in Finance from the University of Colorado Leeds School of Business.

John Mullaly – Vice President, Government Affairs and Energy Regulation. Mr. Mullaly, of Ontario, Canada, is our Vice President, Government Affairs and Energy Regulation, a position he has held since February 14, 2018. Mr. Mullaly had been our Director, Government Relations and Energy since July 2014. Prior to joining us, he worked for Vale S.A. as the Director, Corporate Affairs from 2012 to 2014, with E&Y LLP as a Management Consultant in 2011 and with the Organization for Economic Cooperation and Development in Paris from 2009 to 2011. Mr. Mullaly holds a Bachelor of Commerce from Dalhousie University and a Masters of Business Administration from INSEAD.

Bill Patterson – Vice President, Project Canada. Mr. Patterson, of Colorado, United States, is our Vice President, Project Canada, a position he has held since October 24, 2018. Previously, Mr. Patterson had been our Vice President, Project Studies and Vice President, Global Studies since 2016 and Mexico Regional Study Director since 2014. Prior to joining us, he held positions in business planning, studies and project development for Newmont. Mr. Patterson is a Civil Engineer with global mining exposure in all phases of the mine life cycle including business planning, early stage studies, project engineering, permitting, construction, start-up, operations, and closure. He is a registered Professional Engineer and holds a Master's Degree in Civil Engineering from the University of Colorado and a Masters of Business Administration from the University of Denver.

Lincoln Schreiner – Vice President, Tax. Mr. Schreiner, of British Columbia, Canada, is our Vice President, Tax, a position he has held since April 1, 2017. In his role, Mr. Schreiner is responsible for global tax affairs and compliance, and tax-related support of corporate development and finance activities. He was previously a senior client service partner at PricewaterhouseCoopers LLP, and member of the Canadian partnership board, where he advised large Canadian corporations about financial and tax matters associated with expanding their business affairs domestically and internationally. Mr. Schreiner is a Chartered Professional Accountant (CPA) and holds a Bachelor of Commerce from the University of British Columbia.

Lynsey Sherry – Vice President, Controller. Dr. Sherry, of British Columbia, Canada is our Vice President, Controller, a position she has held since March 19, 2018. Dr. Sherry had been our Director, Group Accounting since July 2017. Dr. Sherry joined us in 2011 and has held increasingly senior leadership positions in the finance department. Prior to joining us, Dr. Sherry was Finance Manager with Yukon-Nevada Gold Corp. from 2010 to 2011, prior to which she was an audit manager with Deloitte LLP in the Vancouver and London offices. Dr. Sherry holds a PhD in Biochemistry from the University of

Manchester and is a Fellow Chartered Accountant with the Institute of Chartered Accountants in England and Wales.

David Stephens – Vice President, Corporate Development and Marketing. Mr. Stephens, of Alberta, Canada, is our Vice President, Corporate Development and Marketing, a position he has held since November 1, 2017. Mr. Stephens had served as our Vice President, Treasurer since March 9, 2016 and prior to that as Director, Business Development from February 2015 to March 2016 and Manager, Business Development from January 2014 to February 2015. Prior to joining us Mr. Stephens operated a private consulting firm from September 2011 to December 2013 that prepared research reports valuing equities in the mining sector for a major investment bank. Prior to that, Mr. Stephens held several increasingly senior roles in the mining investment banking group at Macquarie Capital Markets Canada, culminating with the position of Vice President. Mr. Stephens holds a Bachelor in Electrical Engineering and Computer Science from Harvard University.

Anna M. Tudela, Acc. Dir., CCIP – Vice President, Diversity, Regulatory Affairs and Corporate Secretary. Ms. Tudela, of British Columbia, Canada, is our Vice President, Diversity, Regulatory Affairs and Corporate Secretary, a position she has held since April 30, 2015. Ms. Tudela had been our Vice President, Regulatory Affairs since May 20, 2008. Prior thereto, she had been our Director, Regulatory Compliance from August 2007 to May 2008, was appointed our Corporate Secretary on May 2, 2007 and had been our Director, Legal and Assistant Corporate Secretary from August 15, 2005 to May 2, 2007. Ms. Tudela has more than 30 years of experience in the securities and corporate finance areas. She is a member of the Governance Professionals of Canada, the ICD, the NACD, the British Columbia and Yukon Chamber of Mines, Forum for Women Entrepreneurs BC, the Rocky Mountain Mineral Foundation, Women on Board and the Canadian Centre for Diversity and Inclusion. In 2018, Ms. Tudela became a Canadian Certified Inclusion Professional.

Lisa Wade, M.Sc. – Vice President, Environment, Reclamation and Closure. Ms. Wade, of Washington, United States, is the Vice President, Environment, Reclamation and Closure, a position she has held since March 19, 2018. Ms. Wade had been our Vice President, Environment since August 1, 2015. Ms. Wade joined us in 2005 and had been our Director, Environment since 2010. Prior to joining us, Ms. Wade had worked with Newmont since 1996 at the Twin Creeks Mine in Nevada and held progressively more senior positions in the US and Latin America. Ms. Wade holds a Bachelor of Science and Masters of Science in Environmental Engineering from Montana Tech in Butte, Montana.

As at the date of this annual information form, our directors and executive officers, as a group, beneficially owned, directly or indirectly, or exercised control or direction over 5,224,602 Common Shares, representing less than one percent of the total number of Common Shares outstanding before giving effect to the exercise of options or warrants to purchase Common Shares held by such directors and executive officers. The statement as to the number of Common Shares beneficially owned, directly or indirectly, or over which control or direction is exercised by our directors and executive officers as a group is based upon information furnished by the directors and executive officers.

Cease Trade Orders, Bankruptcies, Penalties and Sanctions

None of our directors or executive officers is, or within ten years prior to the date hereof has been, a director, chief executive officer or chief financial officer of any company (including Goldcorp) that: (i) was subject to a cease trade order, an order similar to a cease trade order or an order that denied the relevant company access to any exemption under securities legislation, that was in effect for a period of more than 30 consecutive days, that was issued while the director or executive officer was acting in the capacity as director, chief executive officer or chief financial officer; or (ii) was subject to a cease trade order, an order similar to a cease trade order or an order that denied the relevant company access to any exemption under securities legislation, that was in effect for a period of more than 30 consecutive days, that was issued after the director or executive officer ceased to be a director, chief executive officer or chief financial officer and which resulted from an event that occurred while that person was acting in the capacity as director, chief executive officer or chief financial officer.

None of our directors, executive officers, or shareholders holding a sufficient number of our securities to affect materially control of Goldcorp: (i) is, or within ten years prior to the date hereof has been, a director or executive officer of any company (including Goldcorp) that, while that person was acting in that capacity, or within a year of that person ceasing to act in that capacity, became bankrupt, made a proposal under any legislation relating to bankruptcy or insolvency or was subject to or instituted any proceedings, arrangement or compromise with creditors or had a receiver, receiver manager or trustee appointed to hold its assets; or (ii) has, within ten years prior to the date hereof, become bankrupt, made a proposal under any legislation relating to bankruptcy or insolvency, or become subject to or instituted any proceedings, arrangement or compromise with creditors, or had a receiver, receiver manager or trustee appointed to hold the assets of the director, executive officer or shareholder, other than Mr. Garofalo, who was a director of Colossus from December 2012 to November 2013. On January 14, 2014, Colossus announced that it had filed a notice of intention to make a proposal under the Bankruptcy and Insolvency Act (Canada), which was intended to enable Colossus to pursue a restructuring process. Colossus' proposal and plan of reorganization ("**Plan**") was approved by creditors on February 25, 2014 and, following the approval of the Ontario Superior Court of Justice (Commercial List) in March 2014, was implemented by Colossus in April 2014. The Plan effectively converted all of Colossus' outstanding debt, and its obligations under a precious metals stream agreement, into equity of the company.

None of our directors, executive officers, or shareholders holding a sufficient number of our securities to affect materially the control of Goldcorp, has been subject to: (i) any penalties or sanctions imposed by a court relating to securities legislation or by a securities regulatory authority or has entered into a settlement agreement with a securities regulatory authority; or (ii) any other penalties or sanctions imposed by a court or regulatory body that would likely be considered important to a reasonable investor in making an investment decision, other than Ian Telfer, who entered into a settlement agreement with staff of the Ontario Securities Commission in September 2013 with respect to allegations that he acted contrary to the public interest in connection with a private share transaction in 2008. Pursuant to the settlement agreement, Mr. Telfer paid C\$200,000 towards the cost of the investigation.

Conflicts of Interest

To the best of our knowledge, and other than as disclosed in this annual information form, there are no known existing or potential conflicts of interest between us and any of our directors or officers, except that certain of the directors and officers serve as directors and officers of other public companies and therefore it is possible that a conflict may arise between their duties as a director or officer of Goldcorp and their duties as a director or officer of such other companies. See "Risk Factors — Certain of our directors and officers also serve as directors and/or officers of other companies involved in natural resource exploration and development and consequently there exists the possibility for these directors and officers to be in a position of conflict" above.

INTEREST OF MANAGEMENT AND OTHERS IN MATERIAL TRANSACTIONS

Other than as described in this annual information form, since January 1, 2015, none of our directors, executive officers or 10% shareholders or any associate or affiliate of any such person or company, has

or had any material interest, direct or indirect, in any transaction that has materially affected or will materially affect us or any of our subsidiaries.

TRANSFER AGENT AND REGISTRAR

The transfer agent and registrar for our Common Shares in Canada is AST Trust Company (Canada) at its principal offices in Vancouver, British Columbia and Toronto, Ontario. The co-transfer agent and registrar for our Common Shares in the United States is Mellon Investor Services LLC at its principal offices in Jersey City, New Jersey.

LEGAL PROCEEDINGS

On October 28, 2016 and February 14, 2017, separate purported class actions were commenced in the Ontario Superior Court of Justice pursuant to the *Class Proceedings Act* (Ontario) against Goldcorp and certain of its current and former officers. Both statement of claims alleged common law negligent misrepresentation in our public disclosure concerning the Peñasquito Mine and pleaded an intention to seek leave from the Court to proceed with an allegation of statutory misrepresentation pursuant to the secondary market civil liability provisions under the *Securities Act* (Ontario). By a consent order, the latter lawsuit will proceed, and the former action has been stayed. The active lawsuit purports to be brought on behalf of persons who acquired our securities in the secondary market during an alleged class period from October 30, 2014 to August 23, 2016. We believe the allegations made in the claim are without merit and intend to vigorously defend against this matter.

MATERIAL CONTRACTS

Other than contracts entered into in the ordinary course of business, we have not entered into any material contracts within the financial year ended December 31, 2018 or before such time that are still in effect.

INTERESTS OF EXPERTS

Brad Armstrong, P.Eng., Maura Kolb, P.Geo., and Nuri Hmidi, P.Eng., have acted as qualified persons on the Red Lake Report and have reviewed and approved the information related to the Red Lake Mines contained in this annual information form. Each of the aforementioned persons is an employee of Goldcorp.

Dr. Anne Charland, P.Geo., Mr. Martin Perron, P.Eng., Ms. Adrienne Rispoli, P.Eng., Mr. Martin Bussi res, P.Eng., and Ms. Sophie Bergeron, P.Eng., have acted as qualified persons on the  l onore Report and have reviewed and approved the information related to the  l onore Mine contained in this annual information form. Each of the aforementioned persons is an employee of Goldcorp.

Dr. Guillermo Pareja, P.Geo., Victor Vdovin, P.Eng. and Peter Lind, P.Eng., have acted as qualified persons on the Pe asquito Report and have reviewed and approved the information related to the Pe asquito Mine contained in this annual information form. Each of the aforementioned persons is an employee of Goldcorp.

Rosmary Cardenas, P.Eng., Hugo Miranda, MBA, ChMC (RM), and Holger Krutzelmann, P.Eng., of Roscoe Postle Associates Inc., have acted as qualified persons in connection with the Pueblo Viejo Report and have reviewed and approved the information related to the Pueblo Viejo Mine contained in this annual information form. Each of Rosmary Cardenas, Hugo Miranda and Holger Krutzelmann is independent of Goldcorp.

Andrew Tripp, P.E., Dr. Sally Goodman, P.Geo., Dr. Guillermo Pareja, P.Geo., and Kevin Murray, P.Eng., have acted as qualified persons on the Cerro Negro Report and have reviewed and approved the information related to the Cerro Negro Mine contained in this annual information form, other than the Mineral Reserve and Mineral Resource estimations. Andrew Tripp, P.E., Dr. Guillermo Pareja, P.Geo., and Kevin Murray, P.Eng. are employee of Goldcorp. Patrick Garretson, SME Registered Member, our

Director, Resources and Reserves, has reviewed and approved the Mineral Reserve and the Mineral Resource estimation with respect to the Cerro Negro Mine contained in this annual information form.

All other scientific and technical information in this annual information form, including under the heading “Technical Information – Summary of Ore Reserve/Mineral Reserve and Mineral Resource Estimates”, has been reviewed and approved by Patrick Garretson, SME Registered Member, our Director, Resources and Reserves, who is a qualified person under NI 43-101.

As at the date hereof, Patrick Garretson, SME Registered Member, Brad Armstrong, P.Eng., Maura Kolb, P.Geo., Nuri Hmidi, P.Eng., Dr. Anne Charland, P.Geo., Mr. Martin Perron, P.Eng., Ms. Adrienne Rispoli, P.Eng., Mr. Martin Bussi eres, P.Eng., Ms. Sophie Bergeron, P.Eng., Dr. Guillermo Pareja, P.Geo., Victor Vdovin, P.Eng. Peter Lind, P.Eng., Andrew Tripp, P.E., Dr. Sally Goodman, P.Geo., Kevin Murray, P.Eng., Rosmery Cardenas, P.Eng., Hugo Miranda, MBA, ChMC (RM) and Holger Krutzelmann, P.Eng. collectively hold less than one percent of our outstanding securities or of any our associates or affiliates.

Deloitte LLP (“**Deloitte**”) is our Independent Registered Public Accounting Firm and is independent within the meaning of the Rules of Professional Conduct of the Chartered Professional Accountants of British Columbia and the applicable rules and regulations of the Securities and Exchange Commission and the Public Company Accounting Oversight Board (United States).

AUDIT COMMITTEE

The Audit Committee is responsible for monitoring our systems and procedures for financial reporting and internal control, reviewing certain public disclosure documents and monitoring the performance and independence of our external auditors. The Audit Committee is also responsible for reviewing our audited annual consolidated financial statements, unaudited interim consolidated financial statements and management's discussion and analysis of financial results of operations for both annual and interim consolidated financial statements and review of related operations prior to their approval by the Board.

The Audit Committee's charter sets out its responsibilities and duties, qualifications for membership, procedures for committee member removal and appointments and reporting to the Board. A copy of the charter is attached as Schedule "A".

The members of our Audit Committee as at the date of this annual information form are Beverley A. Briscoe (Chair), Clement Pelletier and Kenneth F. Williamson. Blanca Treviño was a member of the Audit Committee until her retirement from our Board on April 26, 2018. Each of Misses. Briscoe and Treviño and Messrs. Pelletier and Williamson are independent and financially literate within the meaning of National Instrument 52-110 *Audit Committees* ("NI 52-110"). In addition to being independent directors as described above, all members of the Audit Committee must meet an additional "independence" test under NI 52-110 in that their directors' fees are the only compensation they, or their firms, receive from us and that they are not affiliated with Goldcorp. The meaning of independence under NI 52-110 is set out in Schedule "A" to the Audit Committee's charter.

The Audit Committee met four times in 2018. Each of Beverley A. Briscoe (Chair), Clement Pelletier and Kenneth F. Williamson were present at all four meeting. Blanca Treviño was present at all meetings of the Audit Committee until her retirement from the Board on April 26, 2018.

Relevant Education and Experience

Set out below is a description of the education and experience of each audit committee member that is relevant to the performance of his or her responsibilities as an audit committee member:

Beverley A. Briscoe – Director. Ms. Briscoe has been President of Briscoe Management Limited since 2004 and is Chair of the Board of Ritchie Bros. Auctioneers Incorporated. She is the past Chair of the Audit Committee for the Office of the Superintendents of Financial Institutions. She is a Fellow of the Institute of Chartered Accountants, a Fellow of the ICD in Canada and holds a Bachelor of Commerce from the University of British Columbia. Ms. Briscoe brings an important range of extensive and diverse financial, accounting and business experience to the Board. In addition, Ms. Briscoe's experience managing financial and reporting matters benefits Goldcorp with respect to the issues overseen by the Audit Committee. In 2016, Ms. Briscoe was named to the 2016 National Association of Corporate Directors' (NACD) Directorship 100. Ms. Briscoe is a member of the NACD and the ICD.

Clement Pelletier – Director. Mr. Pelletier is a process chemist/metallurgist by training with 14 years in the mining industry and 35 years in resource-related mine/environmental consulting. Since 1981 as founder and President of Rescan Group. Mr. Pelletier holds a Bachelor of Science in Chemistry/Metallurgy from the University of Saskatchewan and a Diploma from the Colorado School of Mines. Mr. Pelletier is a Fellow of the CIM. Mr. Pelletier's extensive experience in the industry and environmental and technical expertise provides valuable insight and makes him a significant resource to both the Board and management. Mr. Pelletier is a member of the NACD and ICD.

Kenneth F. Williamson – Director. Mr. Williamson was Vice-Chairman, Investment Banking at Midland Walwyn/Merrill Lynch Canada Inc. from 1993 to 1998. Prior to that, he worked at Walwyn/Merrill in Investment Banking with increasing responsibility and titles since 1980. He has worked in the securities industry for more than 25 years, concentrating on financial services and the natural resource industries in the United States and Europe. He holds a Bachelor of Applied Science (P.Eng.) from the University of Toronto and a Masters of Business Administration from

the University of Western Ontario. Mr. Williamson's experience in the investment banking and natural resources industries, in both domestic and international markets, combined with his knowledge of commodities and securities markets, provides the Board with valuable insight and perspective on these issues. In addition, Mr. Williamson brings valuable financial expertise and understanding to the Board. Mr. Williamson is a member of the NACD and ICD.

Pre-Approval Policies and Procedures

The Audit Committee's charter sets out responsibilities regarding the provision of non-audit services by our independent registered chartered accountant. This policy encourages consideration of whether the provision of services other than audit services is compatible with maintaining the auditor's independence and requires Audit Committee pre-approval of permitted audit and audit-related services.

External Auditor Service Fees

Deloitte has served as our chartered professional accountant for each of the fiscal years ended December 31, 2018 and 2017. Fees paid to Deloitte in 2018 and 2017 are set out below:

	2018	2017
	<i>(amount in C\$ thousands)</i>	
Audit Fees ⁽¹⁾	\$6,409	\$6,376
Audit-related Fees ⁽²⁾	206	361
Tax Fees ⁽³⁾	173	286
All Other Fees ⁽⁴⁾	174	36
Total	\$6,962	\$7,059

Notes:

- (1) Audit fees include fees for services rendered by the external auditors in relation to the audit and review of our financial statements and in connection with our statutory and regulatory filings. The change in audit fees in 2018 compared to 2017 is primarily related to the timing of audit billings and additional fees charged due to the transaction work performed in 2018.
- (2) In 2018, audit-related fees primarily related to the ESTMA audit (\$54,000) and the audit of our defined benefit plans (\$43,000). In 2017, audit-related fees primarily related to assistance with translation services (\$184,000), ESTMA audit (\$49,000) and the audit of our defined benefit plans (\$38,000).
- (3) In 2018, tax fees mainly related to of tax compliance and transfer pricing services.
- (4) In 2018, other fees relate to the assessment of our sustainability framework, along with due diligence engagements related to transactions during the year (\$170,000).

Auditor Partner Rotation

As a registrant with the United States Securities and Exchange Commission, the signing Deloitte audit partner and the engagement quality control partner cannot serve in those roles on our audit team for more than five consecutive years. Deloitte audit partners of our subsidiaries whose assets or revenues constitute 20% or more of the assets or revenues of our respective consolidated assets or revenues cannot serve in this role for more than seven consecutive years.

ADDITIONAL INFORMATION

Additional information relating to Goldcorp can be found on SEDAR at www.sedar.com; on the United States Securities and Exchange Commission website at www.sec.gov; or on our website at www.goldcorp.com. Additional information, including directors' and officers' remuneration and indebtedness, principal holders of our securities and securities authorized for issuance under equity compensation plans is contained in our management information circular dated March 12, 2018 for our annual general and special meeting held on April 25, 2018, which will be available on SEDAR at www.sedar.com. Additional financial information is provided in our audited consolidated financial statements and management's discussion and analysis for the financial year ended December 31, 2018.

Schedule “A”
Terms of Reference for the Audit Committee

I. PURPOSE

The Audit Committee (“Audit Committee” or “Committee”) is a committee of the Board of Directors (the “Board”) of Goldcorp Inc. (“Goldcorp” or the “Company”). The purpose of the Audit Committee is to assist the Board in fulfilling its responsibilities in relation to internal control and financial reporting, and carries out certain oversight functions on behalf of the Board, including the oversight of:

- A. the accuracy, integrity and timeliness of the Company’s financial statements and other financial information provided by the Company to securities regulators, governmental bodies and/or the public.
- B. the Company’s compliance with legal and regulatory requirements.
- C. assessing the independence, qualifications, performance and recommending the appointment of the Company’s independent auditors to the Company’s Board of directors;
- D. overseeing the non-audit services provided by the independent auditors.
- E. assessing the performance of the Company’s internal audit function.
- F. assessing the standards of business conduct and ethics for directors, senior management and employees.
- G. assessing management’s evaluation of the effectiveness of internal controls.
- H. assessing the Company’s enterprise risk management framework.

II. COMPOSITION AND OPERATIONS

- A. The Committee shall operate under the guidelines applicable to all Board committees, which are located in item 31(vii) of Tab A-8, Board Guidelines.
- B. The Audit Committee shall be comprised of at least three directors, all of whom are required to be “independent” as such term is defined in Appendix A of the Board Guidelines.
- C. In addition, unless otherwise authorized by the Board, no director shall be qualified to be a member of the Audit Committee if such director (i) is an “affiliated person”, as defined in Appendix One, or (ii) receives (or his/her immediate family member or the entity for which such director is a director, member, partner or principal and which provides consulting, legal, investment banking, financial or other similar services to the Company receives), directly or indirectly, any consulting, advisory, or other compensation from the Company other than compensation for serving in his or her capacity as member of the Board and as a member of Board committees.
- D. All members shall, to the satisfaction of the Board of Directors, be “financially literate” as defined in Appendix One, and at least one member shall have

accounting or related financial management expertise to qualify as a “financial expert” as defined in Appendix One.

- E. If a Committee member simultaneously serves on the audit committees of more than three public companies, the Committee shall seek the Board’s determination as to whether such simultaneous service would impair the ability of such member to effectively serve on the Company’s audit committee and ensure that such determination is disclosed.
- F. The Committee shall meet at least four times annually, or more frequently as circumstances require. The Committee shall meet within 45 days following the end of each of the first three financial quarters to review and discuss the unaudited financial results for the preceding quarter and the related MD&A and shall meet within 90 days following the end of the fiscal year end to review and discuss the audited financial results for the year and related MD&A prior to their publishing.
- G. The Committee may ask members of management or others to attend meetings and provide pertinent information as necessary. For purposes of performing their audit related duties, members of the Committee shall have full access to all corporate information and shall be permitted to discuss such information and any other matters relating to the financial position of the Company with senior employees, officers and independent auditors of the Company.
- H. As part of its job to promote and foster open communication, the Committee should meet at least annually with management, the internal auditor and the independent auditors in separate executive sessions to discuss any matters that the Committee or each of these groups believe should be discussed privately. In addition, the Committee or at least its Chair should meet with the independent auditors and management quarterly to review the Company’s financial statements.
- I. Each of the Chair of the Committee, members of the Committee, Chair of the Board, independent auditors, Chief Executive Officer, Chief Financial Officer or Corporate Secretary shall be entitled to request that the Chair of the Audit Committee call a meeting which shall be held within 48 hours of receipt of such request.

III. RESPONSIBILITIES AND DUTIES

To fulfill its responsibilities and duties the Audit Committee shall:

- A. Approve an agenda for the upcoming year.
- B. Review and update these Terms of Reference at least annually, or as conditions dictate.
- C. Describe in the Company’s Management Information Circular the Committee’s composition and responsibilities and how they were discharged.

D. Review Significant and Material Financial Documents and support related thereto to be released by the Company and other documents as outlined herein:

- i) Review with management, the independent auditors, and the internal auditor, the Company's interim and annual financial statements, management discussion and analysis, earnings releases and any reports or other financial information to be submitted to any governmental and/or regulatory body, or the public, including any certification, report, opinion, or review rendered by the independent auditors for the purpose of recommending their approval to the Board prior to their filing, issue or publication. The Chair of the Committee may represent the entire Committee for purposes of this review in circumstances where time does not allow the full Committee to be available.
- ii) Review analyses prepared by management, and/or the internal auditor, and/or the independent auditors setting forth significant financial reporting issues and judgments made in connection with the preparation of the financial statements, including analyses of the effects of alternative GAAP and IFRS methods on the financial statements.
- iii) Review the effect of regulatory and accounting initiatives, as well as off balance sheet structures, on the financial statements of the Company.
- iv) Ensure that adequate procedures are in place for the review of the Company's public disclosure of financial information extracted or derived from the issuer's financial statements, as well as review any financial information, non-GAAP metrics contained in the MDA and basis of presentation and earnings guidance provided to analysts and periodically assess the adequacy of those procedures.
- v) Review policies and procedures with respect to directors' and officers' expense accounts and management perquisites and benefits, including their use of corporate assets and expenditures related to executive travel and entertainment, and review the results of the procedures performed in these areas by the independent auditors and/or the internal auditor.
- vi) Review expenses of the Non-Executive Board Chair and of the CEO annually.
- vii) Review the Company's aircraft flight record annually.

E. Interaction with the Independent Auditors (the "Auditor") will be as follows:

- i) The Auditor will report directly to the Audit Committee as representatives of the shareholders. They are to be available to the Audit Committee and the full Board as needed.
- ii) In consultation with the Chief Executive Officer and Chief Financial Officer, recommend to the Board and approve the selection of the Auditor, and consider the Auditor's independence and effectiveness, and approve the Auditor's fees and other compensation.
- iii) Continuously monitor the relationship between management and the Auditor including reviewing any management letters or other reports

issued and discussing any material differences of opinion between management and the auditor.

- iv) Review and discuss, on an annual basis, with the Auditor all significant relationships they have with the Company to determine their independence and report to the Board of Directors.
- v) Review and approve requests for any non-audit services to be performed by the Auditor. Pre-approval of non-audit services is satisfied if:
 - a) the aggregate amount of non-audit services that were not pre-approved is expected to constitute no more than 5% of the total amount of fees paid by the Company and its subsidiaries to the Auditor during fiscal year in which the services are provided;
 - b) the Company or a subsidiary did not recognize the services as non-audit at the time of the engagement; and
 - c) the non-audit services are promptly brought to the attention of the Committee prior to the completion of the audit and are approved by the Committee or by one or more of its members to whom authority to grant such approvals has been delegated by the Committee.
- vi) Ensure disclosure of any specific policies or procedures adopted by the Committee to satisfy pre-approval requirements for non-audit services by the Auditor.
- vii) Review the relationship of non-audit fees to audit fees paid to the Auditor, to ensure that the Auditor's independence is maintained.
- viii) Ensure that both the audit and non-audit fees are disclosed to shareholders by category.
- ix) Review the performance of the Auditor and approve any proposed discharge and replacement when circumstances warrant. Consider with management and the Auditor the rationale for employing accounting/auditing firms other than the Auditor. Report on the foregoing to the Board.
- x) At least annually, consult with the Auditor, out of the presence of management, about significant risks or exposures, internal controls and other steps that management has taken to control such risks, and the fullness and accuracy of the organization's financial statements. Particular emphasis should be given to the adequacy of internal controls to expose any payments, transactions, or procedures that might be deemed illegal or otherwise improper.
- xi) At least annually, receive input from the CEO and/or the CFO on audit quality, quality of engagement team, and relationship with the auditor.
- xii) Oversee the work of the Auditor engaged for the purpose of preparing or issuing an audit report or performing other audit, review or attestation services.

- xiii) Ensure that the Auditors are prohibited from providing the following non-audit services and determining which other non-audit services the independent auditors are prohibited from providing:
 - a) bookkeeping or other services related to the accounting records or financial statements of the Company;
 - b) financial information systems design and implementation;
 - c) appraisal or valuation services, fairness opinions, or contribution-in-kind reports;
 - d) actuarial services;
 - e) internal audit outsourcing services;
 - f) management functions or human resources;
 - g) broker or dealer, investment adviser or investment banking services;
 - h) legal services and expert services unrelated to the audit; and
 - i) any other services which the Public Company Accounting Oversight Board determines to be impermissible.
- xiv) At least every 5 years, perform a comprehensive review of the Auditor, including a comprehensive review of the firm's history with the Auditor.

F. Provide oversight of Internal Audit as follows:

- i) Review and approve the mandate, risk assessment, audit coverage, planned areas of focus, budget and staffing of internal audit.
- ii) Review the independence of the internal audit function.
- iii) Review the quarterly report of the leader of internal audit regarding internal audit findings, and the Company's progress in remedying any audit findings.
- iv) Quarterly, meet with the leader of internal audit to discuss the adequacy of the Company's internal controls, significant risks and other matters.
- v) Annually assess the performance of the leader of internal audit, including the role and effectiveness of internal audit in the overall context of the Company's risk management and control system.

G. Financial Reporting Processes

- i) In consultation with the Auditor, review the integrity of the organization's financial and accounting controls and reporting processes, both internal and external.

- ii) Consider the Auditor's judgments about the quality and appropriateness, not just the acceptability, of the Company's accounting principles and financial disclosure practices, as applied in its financial reporting, particularly about the degree of aggressiveness or conservatism of its accounting principles and underlying estimates and whether those principles are common practices or are minority practices.
- iii) Consider and approve, if appropriate, major changes to the Company's accounting principles and practices as suggested by management with the concurrence of the Auditor and ensure that the accountants' reasoning is described in determining the appropriateness of changes in accounting principles and disclosure.

H. Review of Results related to External and Internal Audits

- i) Discuss with the Auditor (i) the Auditor's internal quality-control procedures; and (ii) any material issues raised by the most recent internal quality-control review, or peer review, of the Auditor, or by any inquiry of investigation by governmental or professional authorities, within the preceding five years, respecting one or more independent audits carried out by the Auditor, and any steps taken to deal with any such issues.
- ii) Review and approve hiring of employees or former employees of the Auditor and former independent auditors for senior financial positions.
- iii) Establish regular and separate systems of reporting to the Committee by each of management and the Auditor regarding any significant judgments made in management's preparation of the financial statements and the view of each as to appropriateness of such judgments.
- iv) Review the scope and plans of the Auditor's audit and reviews prior to the audit and reviews being conducted. The Committee may authorize the Auditor to perform supplemental reviews or audits as the Committee may deem desirable.
- v) Following completion of the annual audit and quarterly reviews, review separately with each of management and the Auditor any significant changes to planned procedures, any difficulties encountered during the course of the audit and reviews, including any restrictions on the scope of work or access to required information and the cooperation that the Auditor received during the course of the audit and reviews.
- vi) Review any significant disagreements among management and the Auditor in connection with the preparation of the financial statements.
- vii) Where there are significant unsettled issues the Committee shall ensure that there is an agreed course of action for the resolution of such matters.
- viii) Review with the Auditor and management significant findings during the year and the extent to which changes or improvements in financial or accounting practices, as approved by the Committee, have been implemented. This review should be conducted at an appropriate time

subsequent to implementation of changes or improvements, as decided by the Committee.

- ix) Review the activities, organizational structure, and qualifications of the CFO, the financial reporting staff and ensure that succession planning issues are raised for consideration to the Board.

I. Review with the Company's General Counsel the Company's legal and ethics compliance matters including:

- i) the Company's systems that ensure that the Company's financial statements, reports and other financial information disseminated to governmental organizations and the public satisfy legal requirements;
- ii) Legal and regulatory compliance matters; that could have a significant impact on the Company's financial statements.
- iii) Compliance with Canadian, U.S. and other international securities law requirements;
- iv) the CEO and CFO's written certification of the annual and interim financial statements and MD&A and the Annual Information Form; and
- v) An annual review of the Company's compliance program.

J. Oversight of Risk Management (Enterprise Risk Management)

In overseeing the Company's risk management function, the Committee shall review, monitor, report and, where appropriate, provide recommendations to the Board on the following:

- i) Management's program of risk assessment and steps taken to address significant risks or exposures, including insurance coverage.
- ii) The Company's privacy and cyber security risk exposures and measures taken to protect the security and integrity of its management information systems and company data.
- iii) Management's assessment of the internal control risks and exposures to the Company and the steps management has taken or will take to minimize such risks.
- iv) Ensure that the disclosure process followed by the Board and its committees, in the oversight of the Company's management of principal business risks, is complete and fairly presented.
- v) The Corporation's crisis management and response plans and business continuity plans (including work stoppage and disaster recovery plans).

K. General

- i) Conduct or authorize investigations into any matters within the Committee's scope of responsibilities. The Committee shall be empowered to retain independent counsel, accountants and other professionals to assist it in the conduct of any investigation.

- ii) Establish procedures for the receipt, retention and treatment of complaints received by the Company regarding accounting, internal accounting controls, or auditing matters; and the confidential, anonymous submission by employees of concerns regarding questionable accounting or auditing matters.
- iii) Ensure disclosure in the Annual Information Form if, at any time since the commencement of most recently completed financial year, the issuer has relied on any possible exemptions for Audit Committees.
- iv) Perform any other activities consistent with these Terms of Reference, the Company's Articles and By-laws and all relevant laws and regulations, as the Committee or the Board deems necessary or appropriate.
- v) Conduct a Committee annual self-evaluation and report to the Board of Directors.

IV. ACCOUNTABILITY

- A. The Committee Chair has the responsibility to make periodic reports to the Board, as requested, on audit and financial matters relative to the Company.
- B. The Committee shall report its discussions to the Board by maintaining minutes of its meetings and providing an oral report at the next Board meeting.
- C. The minutes of the Audit Committee should be filed with the Corporate Secretary.

Appendix One: Definitions Related to Audit Committee Composition

Affiliated Person under SEC Rules

An “affiliated person”, in accordance with the rules of the United States Securities and Exchange Commission adopted pursuant to the *Sarbanes-Oxley Act*, means a person who directly or indirectly controls the Company, or a director, executive officer, partner, member, principal or designee of an entity that directly, or indirectly through one or more intermediaries, controls, or is controlled by, or is under common control with, the Company.

Financial Literacy Under National Instrument 52-110

“Financially literate”, in accordance with NI 52-110, means that the director has the ability to read and understand a set of financial statements that present a breadth and level of complexity of accounting issues that are generally comparable to the breadth and complexity of the issues that can reasonably be expected to be raised by the Company’s financial statements.

Financial Expert Under SEC Regulation S-K

A person will qualify as “financial expert” if he or she possesses the following attributes:

- a) an understanding of financial statements and generally accepted accounting principles;
- b) the ability to assess the general application of such principles in connection with the accounting for estimates, accruals and reserves;
- c) experience preparing, auditing, analyzing or evaluating financial statements that present a breadth and level of complexity of accounting issues that are generally comparable to the breadth and complexity of issues that can reasonably be expected to be raised by the Company’s financial statements, or experience actively supervising one or more persons engaged in such activities;
- d) an understanding of internal controls and procedures for financial reporting; and
- e) an understanding of audit committee functions.

A person shall have acquired such attributes through:

- a) education and experience as a principal financial officer, principal accounting officer, controller, public accountant or auditor or experience in one or more positions that involve the performance of similar functions;
- b) experience actively supervising a principal financial officer, principal accounting officer, controller, public accountant, auditor or person performing similar functions;
- c) experience overseeing or assessing the performance of companies or public accountants with respect to the preparation, auditing or evaluation of financial statements; or
- d) other relevant experience.