

# **MANAGEMENT'S DISCUSSION AND ANALYSIS**

FOR THE YEAR ENDED DECEMBER 31, 2018

# MANAGEMENT'S DISCUSSION AND ANALYSIS

This Management's Discussion and Analysis ("MD&A") has been prepared as at March 14, 2019 and should be read in conjunction with the audited consolidated financial statements of Ero Copper Corp. ("Ero" or "the Company") as at, and for the year ended December 31, 2018, and related notes thereto, which are prepared in accordance with International Financial Reporting Standards ("IFRS") as issued by the International Accounting Standards Board (the "IASB"). All dollar amounts are expressed in US dollars ("US") and tabular amounts are expressed in thousands of US dollars, unless otherwise indicated. References to "\$" or "dollars" are to US dollars, references to "C\$" are to Canadian dollars and references to "R\$" are to Brazilian Reais.

This MD&A contains "forward-looking information" that is subject to risk factors set out in a cautionary note contained at the end of this MD&A. The Company cannot assure investors that such information will prove to be accurate, and actual results and future events may differ materially from those anticipated in such information. The results for the periods presented are not necessarily indicative of the results that may be expected for any future period. Investors are cautioned not to place undue reliance on this forward-looking information. All information contained in this MD&A is current and has been approved by the Board of Directors of the Company as of March 14, 2019, unless otherwise stated.

## **BUSINESS OVERVIEW**

Ero, headquartered in Vancouver, B.C., is a mining company focused on developing its portfolio of assets in Brazil. On October 19, 2017, the Company completed an initial public offering ("IPO") and its common shares began publicly trading on the Toronto Stock Exchange under the symbol "ERO".

The Company's primary asset is a 99.6% interest in the Brazilian copper mining company, Mineração Caraíba S.A. ("MCSA"), 100% owner of the Vale do Curaçá Property with over 39 years of operating history in the region. The Company currently mines copper ore from the Pilar underground mine, its newly constructed Vermelhos underground mine and the R22W open pit mine. In addition to the Vale do Curaçá Property, MCSA owns 100% of the Boa Esperança development project, an IOCG-type copper project located in Pará, Brazil. The Company also owns, directly and indirectly through MCSA, 97.6% of NX Gold S.A. ("NX Gold"), a producing gold mine in Mato Grosso State, Brazil.

Additional information on the Company and its operations, including technical reports on the Vale do Curaçá Property, the NX Gold Mine and the Boa Esperança Project, can be found on the Company's website (www.erocopper.com) and on SEDAR (www.sedar.com).

#### **HIGHLIGHTS**

		2018 - Q4		2018 - Q3		2018		2017 - Q4	2017 (1)
Operating Information									
Copper (MCSA Operations)									
Ore Processed (tonnes)		777,480		663,359		2,257,917		452,371	1,771,209
Grade (% Cu)		1.77		1.38		1.56		1.36	1.31
Cu Production (tonnes) <sup>(2)</sup>		12,104		7,792		30,426		5,334	20,133
Cu Production (lbs) <sup>(2)</sup>		26,685,324		17,177,837		67,076,849		11,759,857	44,384,986
Cu Sold in Concentrate (tonnes)		12,900		6,542		30,107		5,488	19,719
Cu Sold in Concentrate (lbs)		28,439,667		14,422,624		66,374,564		12,010,770	43,472,902
C1 Cash cost of copper produced (per lb) <sup>(3)(4)</sup>	\$	0.99	\$	0.99	\$	1.19	\$	1.54	\$ 1.45
Gold (NX Gold Operations)									
Au Production (ounces)		10,008		10,223		39,808		8,531	25,287
Cash cost of gold produced (per ounce) <sup>3</sup>	\$	540	\$	471	\$	520	\$	586	\$ 790
Financial information (\$millions, except per share amounts)									
Revenues	- \$	85.1	\$	47.3	\$	233.1	\$	49.4	148.2
Gross profit  EBITDA <sup>(3)</sup>	\$	39.0	\$	18.8	\$	82.2	\$	10.3	18.0
	\$	40.2	\$	22.8	\$	70.5	\$	34.7	60.8
Adjusted EBITDA <sup>(3)</sup>	\$	39.0	\$	26.2	\$	99.9	\$	15.6	37.3
Cash flow from operations	\$	24.0	\$	34.3	\$	82.9	\$	21.8	34.7
Net income (loss) attributable to owners of the Company	\$	11.2	\$	4.1	\$	(3.2)	\$	19.5	\$ 22.5
Net income (loss) per share attributable to owners									
of the Company - Basic	\$	0.13	\$	0.05	\$	(0.04)	\$	0.28	0.40
- Diluted	\$	0.13	\$	0.05	\$	(0.04)	\$	0.24	\$ 0.34
Adjusted income (loss) attributable to owners of the Company (3)	\$	7.9	\$	2.6	\$	10.9	\$	(0.2)	\$ (2.2)
Adjusted earnings (loss) per share attributable to owners									
of the Company <sup>(3)</sup> - Basic	\$	0.09	\$	0.03	\$	0.13	\$	(0.00)	\$ (0.04)
- Diluted	\$	0.09	\$	0.03	\$	0.12	\$	(0.00)	\$ (0.03)
Cash and Cash Equivalents	\$	18.9	\$	20.5	\$	18.9	\$	51.1	\$ 51.1
Working Capital (Deficit) <sup>(3)</sup>	\$	(9.3)	\$	(15.8)	\$	(9.3)	\$	42.6	\$ 42.6
Net Debt <sup>(3)</sup>	\$	(130.3)	\$	(118.9)	\$	(130.3)	\$	(85.9)	\$ (85.9)
		()	-	()	-	(====)	-	(22.5)	(55.5)

### **Footnotes**

- [1] Ero was incorporated on May 16, 2016. MCSA and NX Gold was acquired December 12, 2016. Operations did not commence until 1st quarter of 2017 at MCSA.
- [2] Includes 1,250 tonnes (2,755,212 lbs) from the gallery development and trial mining from the newly constructed Vermelhos underground mine during Q3.

All tables in this MD&A that include 2017 income statement and cash flow figures have been recast to present NX Gold as a continuing operation. See 2018 annual financial statements note 4 for details.

# 2018 Annual Highlights

## Strong annual operating performance across business units

- Total annual copper production of 30,426 tonnes compared to 20,133 tonnes produced in 2017, a 51% year-on-year increase in production.
- Total of approximately 2.3 million tonnes of ore grading 1.56% copper mined and processed during the year producing 30,426 tonnes of copper in concentrate after average metallurgical recoveries of 86.3%.
- Full-year copper production result exceeded Company's original 2018 guidance by 15%.
- Achieved full-year C1 Cash cost of \$1.19 per pound of copper produced, within guidance range.
- Total annual gold and silver production at the Company's 97.6% owned high-grade NX Gold Mine of 39,808 ounces gold and 24,700 ounces silver at C1 Cash Costs of \$520 per ounce of gold produced.

<sup>[3] -</sup> C1 Cash cost of copper produced (per lb), C1 - Cash cost of gold ounce produced (per ounce), EBITDA, Adjusted EBITDA, Adjusted earnings (loss), Adjusted net income (loss) per share, Working capital, and Net Debt, and are non-IFRS measures - see page 27 of this MD&A for a discussion of non-IFRS measures.

<sup>[4] -</sup> Starting 2018 in its computation of C1 Cash costs of copper produced, Ero is including the costs of treatment, refinement and other costs and credits associated with selling concentrate to customers.

## Aggressive exploration programs underway

- Well positioned to capitalize on the results of the Company's recently completed district-wide airborne electromagnetic and gravity survey at the Vale do Curaca Property.
- 21 drill rigs currently operating on the Company's Vale do Curaca Property, one of the world's largest active exploration drilling campaigns.
- 5 exploration drill rigs operating at the NX Gold Mine.

## Vermelhos Mine completed on budget and ~4 months ahead of schedule, new near-mine discovery announced

- Early commissioning of the Vermelhos Mine resulted in a total of 206,873 tonnes of ore grading 2.72% copper mined contributing to the annual production result.
- A new discovery, located east and approximately 140 meters below all previously identified mineral resources and planned infrastructure of the mine, was highlighted by drill hole FVS VS-261 that intersected 76.7 meters grading 2.20% copper, including 15.0 meters grading 3.06% copper and 10.0 meters grading 5.74% copper. This new discovery has been interpreted to represent a new sub-vertical zone of mineralization extending from surface to approximately 400 meters below surface and to date has been intersected over a horizontal distance of approximately 350 meters. Subsequent to this, holes drilled to test the near-surface extension of the Vermelhos East Zone intersected high-grade mineralization within 100 meters of surface. The near-surface results were highlighted by hole FVS-311 that intersected 27.4 meters grading 8.39% copper including 17.7 meters grading 10.76% copper. (See the Company's press releases dated September 25, 2018 and December 11, 2018 for additional information on the new Vermelhos discovery).

# Global mineral reserves and resources increased by more than 100% at the Vale do Curaçá Property (see Company's press release dated September 5, 2018 for additional detail)

- 108% increase in Proven and Probable mineral reserves to over 18 million tonnes (with a 55% increase in contained copper) compared to the Proven and Probable mineral reserves set out in the 2017 Vale do Curaçá Technical Report¹ using the same copper price and foreign exchange assumptions of \$2.75/lb and USD: BRL of 3.20, respectively.
- 107% increase in Measured and Indicated mineral resources to over 42 million tonnes (with a 57% increase in contained copper), inclusive of mineral reserves, as compared to the Measured and Indicated mineral resources set out in the 2017 Vale do Curaçá Technical Report<sup>2</sup> at the same geological cut-off grades.
- An updated production plan increased life of mine production with an additional 124,000 tonnes of copper production as compared to the life of mine production plan set out in the 2017 Vale do Curaçá Technical Report.
- The updated plan as set out in the 2018 Vale do Curaçá Technical Report will produce, on average, approximately 41,000 tonnes of copper in concentrate over the first five years at an average C1 cash cost of \$0.94/lb.

## Re-financed outstanding senior secured debt with US\$130 Million in new credit facilities

- The Company refinanced approximately US\$119M of the Company's existing US dollar denominated senior secured debt held in Brazil with a new US\$130 million debt financing with The Bank of Nova Scotia and Bank of Montreal. The new debt is comprised of a US\$80 million senior secured amortizing non-revolving credit facility and a US\$50 million senior secured revolving term credit facility.
- The new debt significantly reduced principal payment obligations in years 2019 and 2020 along with a material reduction in the Company's cost of borrowing compared to the old debt.
- The revolving credit facility also provides enhanced operational and financial flexibility going forward.

## Fourth Quarter Highlights

## Continued strength in operational performance

- Strongest production quarter to date with 12,104 tonnes of copper produced, a 55% quarter-on-quarter increase in copper production.
- Significant quarter-on-quarter improvement in grades processed at the Company's Vale do Curaca Property.
- Fourth quarter mill throughput of 777,480 tonnes grading 1.77% copper producing 12,104 tonnes of copper in concentrate after metallurgical recoveries that averaged 87.8% during the period.
- Copper production reflects quarter-on-quarter increases in contained copper across the Company's underground operating mines, including ore from the newly constructed Vermelhos underground mine (143.7kt mined grading 2.77% copper) and the Pilar underground mine (345.1kt mined grading 2.21% copper).
- Fourth quarter C1 Cash Costs of \$0.99 per pound of copper produced at the Company's Vale do Curaca Property.
- Fourth quarter production and Cash Costs of 10,008 ounces and \$540 per ounce of gold respectively at the Company's NX Gold Mine.
- Technical report entitled "2018 Updated Mineral Resources and Mineral Reserves Statements of Mineração Caraíba's Vale do Curaçá Mineral Assets, Curaçá Valley", dated October 17, 2018 with an effective date of August 1, 2018, prepared by Rubens Jose De Mendonça, MAusIMM, of Planminas and Porfirio Cabaleiro Rodrigues, MAIG, Fábio Valério Cãmara Xavier, MAIG, and Bernardo Horta de Cerqueira Viana, MAIG, all of GE21 (the "2018 Vale do Curaçá Technical Report")
- 2. Technical report entitled "2017 Updated Mineral Resources and Mineral Reserves Statements of Mineração Caraíba's Vale do Curaçá Mineral Assets, Curaçá Valley", dated September 7, 2017 with an effective date of June 1, 2017, prepared by Rubens Mendonça, MAusIMM, of SRK Consultores do Brasil Ltda. as at the date of the report (now of Planminas Projectos e Consultoria em Mineração Ltd. ("Planminas")), and Porfirio Cabaleiro Rodrigues, MAIG, Mário Conrado Reinhardt, MAIG, Fábio Valério Xavier, MAIG, and Bernardo H.C. Viana, MAIG, all of GE21 Consultoria Mineral ("GE21"), who are independent qualified persons under NI 43-101 (the "2017 Vale do Curaçá Technical Report")

## **Sales and Liquidity**

- Revenue from copper and gold sales for the fourth quarter totaled \$85.1 million.
- Tonnes of copper sold in concentrate was almost double that of the previous third quarter with higher grade ore being processed with the newly constructed Vermelhos underground mine coming into commercial production in the fourth quarter.
- The Company ended the quarter with \$21.9 million in total cash (including \$3.0 million of restricted cash).
- The Company's subsidiary, MCSA, currently has unsecured working capital lines of credit with two Brazilian banks totalling R\$60 million (approximately \$15.5 million). These lines are undrawn as of March 14, 2019.
- The Company also has \$5.0 million undrawn on its secured, revolving credit facility in Canada.

#### REVIEW OF OPERATIONS

# Mineração Caraíba S.A. (Vale do Curaçá):

2018 - Q4	2018 - Q3	2018	2017 - Q4	2017 <sup>(1)</sup>
777,480	663,359	2,257,917	452,371	1,771,209
1.77	1.38	1.56	1.36	1.31
12,104	7,792	30,426	5,334	20,133
26,685,324	17,177,837	67,076,849	11,759,857	44,384,986
34.5%	34.2%	34.5%	35.2	35.2
87.8	84.9	86.3	86.9	86.8
37,801	18,692	87,307	15,577	56,341
12,900	6,542	30,107	5,488	19,719
28,439,667	14,422,624	66,374,564	12,010,770	43,472,902
\$ 0.99 \$	0.99	\$ 1.19	\$ 1.54	\$ 1.45
	777,480 1.77 12,104 26,685,324 34.5% 87.8 37,801 12,900 28,439,667	7777,480 663,359 1.77 1.38 12,104 7,792 26,685,324 17,177,837 34.5% 34.2% 87.8 84.9 37,801 18,692 12,900 6,542 28,439,667 14,422,624	777,480         663,359         2,257,917           1.77         1.38         1.56           12,104         7,792         30,426           26,685,324         17,177,837         67,076,849           34.5%         34.2%         34.5%           87.8         84.9         86.3           37,801         18,692         87,307           12,900         6,542         30,107           28,439,667         14,422,624         66,374,564	777,480         663,359         2,257,917         452,371           1.77         1.38         1.56         1.36           12,104         7,792         30,426         5,334           26,685,324         17,177,837         67,076,849         11,759,857           34.5%         34.2%         34.5%         35.2           87.8         84.9         86.3         86.9           37,801         18,692         87,307         15,577           12,900         6,542         30,107         5,488           28,439,667         14,422,624         66,374,564         12,010,770

#### Footnote

- [1] Ero was incorporated on May 16, 2016. MCSA was acquired December 12, 2016. Operations did not commence until 1st quarter of 2017.
- [2] Includes 1,250 tonnes (2,755,212 lbs) from the gallery development and trial mining from the newly constructed Vermelhos underground mine during Q3.
- [3] C1 Cash cost of copper produced (per lb) is a non-IFRS measure see page 27 of this MD&A for a discussion of non-IFRS measures.
- [4] Starting 2018 in its computation of C1 Cash costs, Ero is including the costs of treatment, refinement and other costs and credits associated with selling concentrate to customers.

Both of MCSA's operating mines performed well during the period. The Pilar underground mine continued to meet production expectations and saw a significant quarter-on-quarter improvement in grades mined relative to the third quarter of 2018. During the forth quarter, 345,123 tonnes of ore was mined grading 2.21% copper. The increase in grade mined during the period was driven, in part, by continued development of the high-grade Deepening zone within the mine as well as stope sequencing anticipated during the second half of the year.

At the Company's newly completed Vermelhos Mine, ramp-up to full production was achieved during the period with 143,661 tonnes of ore mined grading 2.77% copper.

The Company completed its envisioned operations at the Surubim open pit mine during the period, where 307,710 tonnes of ore was mined grading 0.76% copper. Subsequent to the end of the period, the Company repositioned its open pit mining fleet and operations to the R22W open pit mine, located just north of the Caraiba Mill.

In total, approximately 2.3 million tonnes of ore grading 1.56% copper was mined and processed during the year ended December 31, 2018. Metallurgical recoveries averaged 87.8% during the fourth quarter and 86.3% for the year ended December 31, 2018. C1 Cash costs averaged \$0.99 per pound of copper produced during the fourth quarter and \$1.19 per pound of copper produced during year ended December 31, 2018.

The Company has an extensive exploration program underway at the Company's Vale do Curaca Property, where 21 exploration drill rigs are currently active. Exploration drilling throughout the first half of the year was primarily focused on known and previously announced extensions of mineralization within the three primary mineral districts of the Curaçá Valley: Vermelhos, Pilar and Surubim.

Exploration activities within the Vermelhos District, located approximately 80 kilometers to the north of the Caraíba Mill complex, which includes the recently completed high-grade Vermelhos underground mine, are focused on evaluating and further delineating a new discovery located east of the main Vermelhos Mine as well as down plunge extensions to depth and lateral expansions along strike of the main Vermelhos ore bodies. The new eastern discovery, to date, has been interpreted as a new zone extending from surface to approximately 400

meters below surface, on average approximately 100 meters east of the main Vermelhos orebodies. To date, the zone has been delineated over a horizontal distance of approximately 350 meters and the zone remains open to depth and along strike. Recent drilling to test the near-surface extension of the East Zone discovery was highlighted by a series of 8 drill holes, including FVS-311 that intersected 27.4 meters grading 8.39% copper including 17.7 meters grading 10.76% copper from 81.2 meters downhole. Drilling continues to evaluate the geological relationships between the new discovery, the main Vermelhos orebodies and the recently announced Vermelhos West deposit, located approximately 1.1 kilometers north-northeast of the new eastern discovery. (See the Company's press releases dated September 25, 2018 and December 11, 2018 for additional discussion on the Vermelhos East Zone discovery).

Within the Vermelhos underground mine's main orebodies, drilling continues to focus on recently announced expansions of mineralization not previously captured in the 2018 Vale do Curaçá Technical Report. Expansion drill results during the period were highlighted by hole FVS-257 that intersected 38.2 meters grading 7.29% copper including 23.1 meters grading 11.16% copper and 10.1 meters grading 4.59% copper, hole FVS-328 that intersected 38.2 meters grading 6.79% copper including 19.4 meters grading 8.38% copper and hole FVS-311 that intersected 31.5 meters grading 8.72% copper and 8.5 meters grading 5.28% copper. These holes represent expansions in modeled thicknesses used in the 2018 Vale do Curaçá Technical Report.

At the Pilar District, drilling continues to focus on infill and step-out drilling of the Deepening Extension, as well as extensions and infill of the previously announced West Limb discovery between the R22 Underground target and the known mining area of P1P2W (see the Company's press release dated May 17, 2018 announcing the West Limb discovery).

Drilling within the Surubim District, located approximately 40 kilometers to the north of the Caraíba Mill complex which includes the Surubim open pit mine, has shifted focus to exploration drilling on properties neighboring the open pit mine as well as extensions to depth below the existing open pit limits following continuity of the open pit resource models to depth, which comprise the previously announced Surubim underground deposit.

## NX Gold S.A.

	2018 - Q4	2018 - Q3	2018	2017 - Q4	2017 (1)
Operating Information					
Gold (NX Gold Operations)					
Ore mined (tonnes)	37,950	30,718	119,469	21,382	134,163
Ore milled (tonnes)	38,464	31,912	117,857	24,121	135,013
Head grade (grams per tonne Au)	8.85	11.04	11.55	12.16	6.59
Recovery (%)	91.5%	90.2%	91.0%	90.5%	88.4%
Gold ounces produced (oz)	10,008	10,223	39,808	8,531	25,287
Silver ounces produced (oz)	6,186	6,431	24,700	5,174	17,710
Gold sold (oz)	10,603	9,807	39,808	8,750	26,441
Silver sold (oz)	6,752	6,201	24,700	5,314	18,657
Cash cost of gold produced (per ounce) <sup>(2)</sup>	\$ 540 \$	471	\$ 520	\$ 586	\$ 790

### **Footnotes**

- [1] Ero was incorporated on May 16, 2016. NX Gold was acquired December 12, 2016.
- [2] C1 Cash cost of gold produced (per ounce) is a non-IFRS measure see page 27 of this MD&A for a discussion of non-IFRS measures.

At the NX Gold Mine, mining and processing operations continued to reach record production metrics largely driven by the high gold grades mined and processed from the Brás and Buracão Veins during the three and twelve month periods ended December 31, 2018. The operational performance gains realized during the period are a continuation of improvement initiatives that commenced during the first half of 2017 in an effort to focus

production and development activities on the highest grade zones within the Brás Vein and the application of a new more selective manual mining method currently being employed in the Buracão Vein. During the three-month period ended December 31, 2018, 37,950 tonnes of ore was mined. Mining and processing operations during the fourth quarter resulted in the production of 10,008 ounces of gold and 6,186 ounces of silver (as by-product) produced from total mill feed of 38,464 tonnes grading 8.88 g/t gold at average metallurgical recoveries of 91.5%. C1 Cash Costs averaged \$540 per ounce of gold produced during the fourth quarter.

In total, 39,808 ounces of gold and 24,700 ounces of silver were produced from the mine during 2018. This production is based on 117,857 tonnes of ore processed grading 11.55 grams per tonne and metallurgical recoveries of 91.0% during the year ended December 31, 2018. C1 Cash Costs averaged \$520 per ounce of gold produced during the year ended December 31, 2018.

Exploration activities picked up significantly during the year. As at the end of the fourth quarter, 5 drill rigs were actively undertaking exploration programs focused on increasing the known extent of the Brás and Buracão Veins as well as new drilling in the central Santo Antônio zone, located between Brás and Buracão. 7 drill rigs are expected to be operating on these targets by the end of the first quarter, 2019 or shortly thereafter.

Please refer to the Company's press releases dated September 5, 2018, September 25, 2018 and December 11, 2018 for additional detail on the Company's 2018 updated mineral reserve and resource estimates and ongoing exploration activities, including new discoveries.

## **Financial Update**

Consolidated revenue for the fourth quarter of 2018 totalled \$85.1 million. Gross profit for the fourth quarter was \$39.0 million.

At MCSA, revenue from copper sales for the fourth quarter totaled \$72.3 million. A total of 12,900 tonnes of copper in concentrate was sold during the quarter representing the highest sales in a quarter to date since the acquisition in 2016. This was largely driven by the declaration of commercial production at the newly constructed Vermelhos Mine early in the fourth quarter. Gross profit from mining operations for the quarter from MCSA was \$33.9 million.

At NX Gold, revenue from gold and silver sales for the fourth quarter totaled \$12.8 million based on sales of 10,603 ounces of gold and 6,752 ounces of silver. Gross profit from mining operations for the quarter from NX Gold was \$5.1 million.

The Company generated overall net income for the quarter of \$11.3 million.

The Company ended the quarter with \$21.9 million in total cash (including \$3.0 million of restricted cash). The working capital deficit improved by \$6.0 million from the previous quarter of September 30, 2018. The working capital position is expected to continue to improve with Vermelhos now in commercial production.

During the fourth quarter, the Company's subsidiary, MCSA, increased its unsecured line of credit with a Brazilian bank from R\$30 million to R\$35 million (approximately \$9.0 million), which is intended for working capital purposes. Subsequent to year end, the Company increased this line of credit to R\$40 million (approximately \$10.3 million) and entered into credit agreements for a total of R\$20 million (approximately \$5.2 million) lines of credit with another Brazilian bank. As of March 14, 2019, these lines of credit are undrawn. In addition, the Company also has \$5.0 million undrawn on its secured, revolving credit facility in Canada.

## 2019 Guidance/Outlook

## Mineração Caraíba S.A.

Copper production in 2019 is expected to have a slight bias towards the first half of the year due to higher-grade stope sequencing at both the Pilar and Vermelhos underground mines as well as incremental production from the R22W open pit mine. R22W is expected to augment underground production during the first half of the year (contributing approximately 250,000 tonnes of ore grading 0.50% copper). Underground production from the Pilar Mine is expected to contribute a total of approximately 1.3 million tonnes grading 1.80% copper while underground production from the Vermelhos Mine is expected to contribute a total of approximately 500,000 tonnes grading 3.20% copper resulting in a blended head grade of approximately 2.00% copper for 2019.

	2018 Original Guidance	2018 Revised Guidance	2018 Result	2019 Guidance <sup>[1]</sup>
Tonnes Processed Sulphides	2,000,000	2,200,000	2,257,917	2,050,000
Copper Grade (% Cu)	1.50%	1.50%	1.56%	2.00%
Copper Recovery (%)	86.0%	86.0%	86.3%	88.0%
Cu Production (000 tonnes)	25.5 – 27.5	28.0 – 29.0	30.4	36.0 – 38.0

<sup>[1] -</sup> Guidance is based on certain estimates and assumptions, including but not limited to, mineral reserve estimates, grade and continuity of interpreted geological formations and metallurgical performance. Please refer to the Company's SEDAR filings for complete risk factors.

The Company's C1 Cash cost guidance<sup>[1]</sup> for 2019 assumes a USD:BRL foreign exchange rate of 3.70, gold price of \$1,200 per ounce and silver price of \$14.50 per ounce.

	2018 Revised Guidance	2019 Guidance
C1 Cash Cost Guidance (US\$/lb) <sup>[1]</sup>	\$1.10 - \$1.20	\$1.00 - \$1.10

<sup>[1] -</sup> C1 Cash Costs of copper produced (per lb.) is a non-IFRS measures - see page 27 of this MD&A for a discussion of non-IFRS measures.

## NX Gold S.A.

From the date of acquisition on December 12, 2016, the Company intended to sell its interest in NX Gold. Accordingly, the assets and liabilities of NX Gold were classified as assets and liabilities held for sale and its results from operations were presented as net income from discontinued operations. During the fourth quarter of 2018, the Company decided not to sell its interest in NX Gold and, instead, continue to own and operate the assets due to encouraging preliminary exploration work and weak capital markets for junior listed gold producers. As such, the assets and liabilities of NX Gold are no longer presented as assets and liabilities held for sale and its results from operations are no longer reflected as income from discontinued operations. The prior year statements of operations and comprehensive income (loss) and cash flow have been adjusted to reflect NX Gold as a continuing operation.

For 2019, the Company expects NX Gold to perform in line with its 2018 production and cost metrics. The strong 2018 financial results have allowed the Company to re-invest cash into expanded exploration activities to gain an increased knowledge of its reserves and resources. Going forward, drilling activities (5 exploration drill rigs currently operating on site) will continue to focus on upgrading known mineral resources into reserves, extending the known mineralization to depth and along strike, as well as advancing priority targets in the immediate mine area – most notably within the central Santo Antônio zone. These exploration activities are centered upon both maintaining the high-grade nature of the operations as well as extending the known life of the mine. The Company expects to provide an updated NI 43-101 technical report and mine plan during the third-quarter of 2019.

## **Boa Esperança**

A full review of the Boa Esperança Feasibility Study<sup>1</sup> is currently being performed with the goal of extending the potential mine life and increasing copper production among other desktop optimization initiatives. The Company expects to provide an update on these initiatives later this year.

- Please refer to the Technical report entitled "Mineral Resource and Reserve Estimate of the NX Gold Mine, Nova Xavantina", dated January 21, 201 with an effective date of August 31, 2018 prepared by of GE21 Consultoria Mineral Ltda., who are independent qualified persons under NI 43-101 (the "NX Gold Mine Technical Report")
- 2. Technical report entitled "Feasibility Study, Technical Report for the Boa Esperança Copper Project, Pará State Brazil", dated September 7, 2017 with an effective date of June 1, 2017, prepared by Rubens Mendonça, MAusIMM of SRK Brazil as at the date of the report (now of Planminas) and Carlos Barbosa, MAIG and Girogio di Tomi, MAusIMM, both of SRK Consultores do Brasil Ltda. ("SRK Brazil") (the "Boa Esperança Feasibility Study")

## **REVIEW OF FINANCIAL RESULTS**

The following table provides a summary of the financial results of the Company for the years ended December 31, 2018, 2017 and 2016. Tabular amounts are in thousands of US dollars, except share and per share amounts.

	Notes	Year o	ended December	Year e	ended December	Perio	od ended December
	Notes		31, 2018		31, 2017		31, 2016 <sup>(1)</sup>
Revenue	1	\$	233,105	Ś	148,241	Ś	2,147
Cost of product sold	2		(147,611)	•	(128,009)	•	(2,317)
Sales expenses			(3,268)		(2,225)		(=,0=,,
Gross profit			82,226		18,007		(170)
Expenses							
General and administrative	3		(29,000)		(22,940)		(2,183)
Share-based compensation			(3,225)		(879)		(3,687)
Income (loss) before the understated			50,001		(5,812)		(6,040)
Other income (expenses)							
Finance income			1,303		2,276		37
Finance expense	4		(22,562)		(20,709)		(879)
Foreign exchange gain (loss)	5		(20,713)		(4,296)		3,026
Gain (loss) on debt settlement	6		(5,476)		28,727		-
Other income Income (loss) before income taxes			108		1,788		(2.715)
Income tax recovery (expense)			2,661		1,974		(3,715)
	7		(2,899)		(1.104)		1.42
Current income tax recovery (expense) Deferred income tax recovery (expense)	7 8				(1,104)		142
Income (loss) for the period			(2,753)		16,614 17,484		(3,452)
. , .			(2,331)		17,464		(3,432)
Other comprehensive income (loss)  Foreign currency translation income (loss)			(27,801)		(973)		8
Comprehensive income (loss)		\$	(30,792)	\$	16,511	\$	(3,444)
Net income (loss) attributable to:			• • • •		·		
Owners of the Company		\$	(3,155)	\$	22,466	Ś	(3,046)
Non-controlling interests			164	•	(4,982)	•	(406)
		\$	(2,991)	\$	17,484	\$	(3,452)
Comprehensive income (loss) attributable to:							
Owners of the Company		\$	(30,845)	\$	21,497	\$	(3,039)
Non-controlling interests			53		(4,986)		(405)
		\$	(30,792)	\$	16,511	\$	(3,444)
Income (loss) per share attributable to owners of the	Company						
Net income (loss) per share							
Basic		\$	(0.04)	\$	0.40	\$	(0.44)
Diluted		\$	(0.04)		0.34		(0.44)
Wainbad arrange arrange of a service a share arrange	alim m						
Weighted average number of common shares outstar	luing		02.027.077		FC 252 252		6.000.000
Basic			83,927,977		56,252,358		6,932,086
Diluted			83,927,977		66,003,387		6,932,086
Cash and cash equivalents		\$	18,941	\$	51,098	\$	18,318
Total assets		\$	360,439		381,343		319,035
Non-current liabilities		\$	196,352		196,265		110,905

<sup>(1)</sup> Period ended December 31, 2016 covers May 16, 2016, the Company' date of inception, to December 31, 2016

### Notes:

- 1. Revenues for the year ended December 31, 2018 from copper sales was \$184.7 million (2017 \$115.4 million) which included the sale of 30,107 copper tonnes (2017 19,719 copper tonnes) in concentrate. As noted in previous disclosure, MCSA resumed operations in January 2017 with sales of copper concentrate only commencing in late February 2017. Commencing in the fourth quarter of 2018, high grade copper from the newly constructed underground Vermelhos ore was being produced and sold. In addition, revenues for the current year include \$48.4 million (2017 \$32.8 million) from the sale of 39,808 gold ounces (2017 26,441 gold ounces) from NX Gold operations.
- 2. Cost of products sold for the year ended December 31, 2018 totaled \$147.6 million (2017 \$128.0 million) which consisted of \$115.3 million (2017 \$100.3 million) related to the sale of copper at MCSA, and \$32.3 million (2017 \$27.7 million) related to the sale of gold ounces at NX Gold. Costs for MCSA included \$34.1 million (2017 \$32.7 million) in depreciation and depletion, \$29.7 million (2017 \$28.7 million) in salaries and benefits, \$17.6 million (2017 \$11.7 million) in contractor services, \$14.9 million (2017 \$11.7 million) in materials and consumables, \$10.8 million (2017 \$8.3 million) in maintenance costs, \$7.5 million (2017 \$6.5 million) in utilities, and \$0.7 million (2017 \$0.7 million) in other costs. Prior year operations at MCSA did not commence until January 2017 and sales of copper concentrate did not commence until the latter portion of February 2017. Cost of product sold for the year ended December 31, 2018 increased relative to the same period in 2017 due to an increase in sales volume resulting from increased production and the commencement of commercial production at Vermelhos underground mine in the fourth quarter of 2018. Costs for NX Gold included \$11.1 million (2017 \$5.4 million) in depreciation and depletion, \$6.4 million (2017 \$7.5 million) in salaries and benefits, \$3.2 million (2017 \$3.4 million) in contractor services, \$4.5 million (2017 \$4.8 million) in materials and consumables, \$5.0 million (2017 \$0.5 million) in other costs.
- 3. General and administrative expenses and share-based compensation for the year ended December 31, 2018 include \$16.3 million (2017 \$14.1 million) with respect to MCSA for salaries and incentive payments, professional fees, office and sundry and provisions for tax, legal and labour claims, \$3.4 million (2017 \$3.3 million) with respect to NX Gold for salaries and incentive payments, professional fees, office and sundry, provisions for tax, legal and labour claims, and \$9.3 million (2017 \$5.5 million) with respect to the corporate head office in Vancouver. Corporate head office costs are primarily comprised of \$6.4 million (2017 \$4.3 million) in salaries, incentive payments, and consulting fees, \$0.9 million (2017 \$0.7 million) in professional fees, \$1.0 million (2017 \$0.5 million) in office and sundry costs, and \$0.9 million (2017 \$0.8 million) in travel-related costs. Overall costs compared to the prior year reflects the growth of operations at both MCSA and corporate head office, which included the hiring of more individuals. The current year also reflects amounts for Brazilian incentive payments in relation to 2017 (\$2.5 million) and 2018 performance, rate increases for individuals as per union contracts in MCSA, as well as corporate incentive payments as a result of exceeding Company targets as set out by the board of directors in 2018.
- 4. Finance expense for the year ended December 31, 2018 was \$22.6 million (2017 \$20.7 million). \$16.2 million (2017 \$18.1 million) was with respect to MCSA, \$1.0 million (2017 \$1.7 million) with respect to NX Gold and \$5.4 million (2017 \$0.9 million) with respect to the corporate head office in Vancouver. MCSA costs are comprised of interest on loans and borrowings of \$8.5 million (2017 \$14.4 million), accretion of purchase price adjustments and accretion of mine closure and rehabilitation provision of \$4.0 million (2017 \$2.7 million) and \$2.7 million (2017 \$1.0 million) of other finance related costs. Corporate head office costs consisted of \$5.4 million (2017 \$0.2 million) of interest on loans and borrowings and \$nil (2017 \$0.7 million) on financing fees. Interest paid was in relation to the \$50 million non-revolving credit facility with Scotia bank (the "Scotia loan") taken out at the end of 2017, which was used to purchase certain debts down at MCSA at a discount. This reduced the overall debt of the Company. A lower interest rate and quicker payback periods resulted in the reduction of interest paid down at MCSA on loans and borrowings for the year, and the Scotia loan and interest taken on by corporate office in the current year.

- 5. Foreign exchange loss for the year ended December 31, 2018 was \$20.7 million (2017 \$4.3 million). This amount is primarily comprised of a loss on foreign exchange forward contracts of \$9.0 million (2017 \$0.6 million loss) as well as a foreign exchange loss of \$9.8 million (2017 \$3.5 million loss) primarily associated with US dollar-denominated loans and borrowings in MCSA, where the functional currency is the Brazilian Real. The foreign exchange losses are a result of the weakening of the Brazilian Real relative to the USD on the US denominated debt.
- 6. The loss on settlement of debt for the year ended December 31, 2018 was \$5.5 million (2017 \$28.7 million gain). The current year loss included \$1.8 million from loan settlement fees when the Company replaced its \$50 million senior secured non-revolving credit facility with a new \$130 million facility from a syndicate of Canadian financial institutions. Also, with some of the funds of the new facility as noted above, the Company acquired and/or settled certain of MCSA's bank loans. The acquisition and/or settlement of these MCSA loans resulted in a loss of \$3.7 million, which included early repayment fees for certain debts. The prior year gain on settlement of debt resulted when a Canadian financial institution purchased certain of MCSA's secured bank loans with a total carrying value of \$76.3 million. The Company then entered into an arrangement with the Canadian financial institution whereby the Company acquired the rights to any and all payments of interest and principal that MCSA makes to the Canadian financial institution over the term of the loans acquired by the Canadian financial institution. These rights that the Company acquired constitute settlement of certain of MCSA's secured bank loans. The Company acquired these rights for \$47.6 million, resulting in a gain on debt settlement of \$28.7 million.
- 7. Current income tax expense in the year ended December 31, 2018 was \$2.9 million (2017 \$1.1 million). The entire amount related to amounts owing by NX Gold (2017 \$0.8 million).
- 8. Deferred tax expense in the current year of \$2.8 million (2017 16.6 million recovery) represent deferred tax expenses at MCSA of \$1.9 million (2017 \$16.6 million), at NX Gold of \$1.2 million (2017 nil) and a deferred tax recovery of \$0.3 million (2017 nil) at the corporate head office. The net deferred tax expense increased principally as a result of changes in the estimated taxable temporary differences associated with the fair value adjustments recorded in relation to the initial acquisition of MCSA and NX Gold by the Company. In 2017 the Company was permitted to settle certain non-income tax-based taxes with existing non-capital loss carry forwards which resulted in the deferred tax recovery in the year of \$16.6 million.

The following table provides a summary of the financial results of the Company for the three-month periods ended December 31, 2018 and 2017. Tabular amounts are in thousands of US dollars, except share and per share amounts.

	Notes		e month period d December 31, 2018	ended De	onth period cember 31, 017
Revenue	1	\$	85,084	\$	49,418
Cost of product sold	2	ş	(44,661)	Ş	(38,501)
•	2		(1,441)		
Sales expenses Gross profit			38,982		(584) 10,333
Expenses					
General and administrative	3		(10,456)		(9,622)
Share-based compensation			(723)		(597)
Income before the understated			27,803		114
Other income (expenses)					
Finance income			773		56
Finance expense	4		(6,776)		98
Foreign exchange gain (loss)	5		7,433		(9,118)
Gain (loss) on debt settlement	6		(5,476)		28,727
Other expenses	7		(5,625)		(742)
Income before income taxes			18,132		19,135
Income tax recovery (expense)					
Current income tax recovery (expense)	8		(1,853)		(515)
Deferred income tax recovery (expense)	9		(4,999)		862
			(6,852)		347
Net income for the period			11,280		19,482
Other comprehensive income (loss)					
Foreign currency translation income (loss)			3,830		(1,321)
Comprehensive income		\$	15,110	\$	18,161
Net income (loss) attributable to:					
Owners of the Company		\$	11,210		19,540
Non-controlling interests			70		(58)
		\$	11,280	\$	19,482
Comprehensive income (loss) attributable to:					
Owners of the Company		\$	15,026		18,224
Non-controlling interests			84		(63)
		\$	15,110	\$	18,161
Income per share attributable to owners of the Company					
Net income per share					
Basic		\$	0.13	\$	0.28
Diluted		\$	0.13	\$	0.24
Weighted average number of common shares outstanding					
Basic			84,736,476		70,929,120
Diluted			89,191,707		81,448,095

#### Notes:

- 1. Revenues for the quarter ended December 31, 2018 from copper sales was \$72.3 million (2017 \$37.8 million) which included the sale of 12,900 copper tonnes in concentrate as compared to 5,488 copper tonnes for the quarter ended December 31, 2017. The increase in revenue in the current quarter was due to the Vermelhos mine coming into commercial production as well as export sales of amounts previously sitting in stockpile inventory. In addition, revenues for the quarter ended December 31, 2018 included \$12.8 million (2017 \$11.6 million) from the sale of 10,603 ounces of gold (2017 8,750 ounces of gold from NX Gold operations.
- 2. Cost of products sold for the quarter ended December 31, 2018 from copper sales was \$36.9 million (2017 \$31.9 million) which consisted of \$9.2 million (2017 \$10.8 million) in depreciation and depletion, \$8.5 million (2017 \$8.7 million) in salaries and benefits, \$7.3 million (2017 \$3.7 million) in contractor services, \$5.6 million (2017 \$3.7 million) in materials and consumables, \$3.4 million (2017 \$2.8 million) in maintenance costs, \$2.5 million (2017 \$2.1 million) in utilities, and \$0.2 million (2017 \$0.2 million) in other costs. Cost of product sold for the three-month period ended December 31, 2018 increased relative to the same period in 2017 due to more copper produced and sold then the comparative quarter in 2017 and as a result of the commencement of commercial production at the Vermelhos underground mine. Cost of product sold for the quarter ended December 31, 2018 from gold sales was \$7.8 million (2017 \$6.5 million) which comprised of \$1.8 million (2017 \$0.3 million) in depreciation and depletion, \$1.8 million (2017 \$2.0 million) in salaries and benefits, \$0.8 million (2017 \$0.9 million) in contractor services, \$1.3 million (2017 \$1.1 million) in materials and consumables, \$1.4 million (2017 \$0.5 million) in maintenance costs, \$0.6 million (2017 \$0.5 million) in utilities, and \$0.1 million (2017 \$0.5 million) in other costs.
- 3. General and administrative expenses for the quarter ended December 31, 2018 include \$3.8 million (2017 \$5.8 million) with respect to MCSA for salaries and incentive payments, professional fees, office and sundry and provisions for tax, legal and labour claims, \$1.8 million (2017 \$1.2 million) with respect to NX Gold for salaries and incentive payments, professional fees, office and sundry and provisions for tax, legal and labour claims and \$4.8 million (2017 \$2.7 million) with respect to the corporate head office in Vancouver. Corporate head office costs are primarily comprised of \$4.0 million (2017 \$2.0 million) in salaries, incentive payments, and consulting fees, \$0.4 million (2017 \$0.2 million) in professional fees, \$0.2 million (2017 \$0.2 million) in office and sundry costs and \$0.2 million (2017 \$0.2 million) in travel-related costs. Current quarter amounts over the previous quarter in the past year reflect the growth of operations at both MCSA and corporate head office, which included the hiring of more individuals. The current year also reflects amounts for Brazilian incentive payments in relation to 2017 (\$2.5 million) and 2018 performance, rate increases for individuals as per union contracts in MCSA, as well as corporate incentive payments as a result of exceeding Company targets as set out by the board of directors in 2018.
- 4. Finance expense for the quarter ended December 31, 2018 was \$6.8 million (2017 \$0.1 million income) and is primarily comprised of interest on loans and borrowings of \$3.1 million and the accretion of the asset retirement obligations at MCSA and other of \$2.1 million and interest on loans at the corporate head office of \$1.5 million (2017 nil).
- 5. Foreign exchange gain for the quarter ended December 31, 2018 was \$7.4 million (2017 \$9.1 million loss). This amount is comprised of a gain on foreign exchange forward contracts of \$3.0 million (2017 \$1.1 million loss) as well as a foreign exchange gain of \$4.8 million (2017 \$7.7 million loss) primarily associated with the translation of US dollar-denominated loans and borrowings in MCSA, where the functional currency is the Brazilian Real. These combined foreign exchange gains were a result of an increase in the valuation of the Brazilian Real relative to the USD during the quarter. There is an additional loss of \$0.4 million (2017 \$0.4 million loss) for other foreign exchange transactions.
- 6. The loss on settlement of debt for the year ended December 31, 2018 was \$5.5 million (2017 \$28.7 million gain). The current year loss included \$1.8 million from loan settlement fees when the Company replaced it's \$50 million senior secured non-revolving credit facility with a new \$130 million facility from a syndicate of Canadian financial institutions. Also, with some of the funds of the new facility as noted above, the Company acquired and/or settled certain MCSA's bank loans. The acquisition and/or settlement of these MCSA loans

resulted in a loss of \$3.7 million, which included early repayment fees for certain debts. The prior year gain on settlement of debt resulted when a Canadian financial institution purchased certain of MCSA's secured bank loans with a total carrying value of \$76.3 million. The Company then entered into an arrangement with the Canadian financial institution whereby the Company acquired the rights to any and all payments of interest and principal that MCSA makes to the Canadian financial institution over the term of the loans acquired by the Canadian financial institution. These rights that the Company acquired constitute settlement of certain of MCSA's secured bank loans. The Company acquired these rights for \$47.6 million, resulting in a gain on debt settlement of \$28.7 million.

- 7. Other expenses for the quarter ended December 31, 2018 of \$5.6 million (2017 \$0.7 million) primarily consisted of \$2.6 million at MCSA associated with state tax credits claimed that were deemed not recoverable and \$1.6 million (2017 \$Nil) at NX Gold associated with state credits claimed that were deemed not recoverable.
- 8. Current income taxes expense in the quarter ended December 31, 2018 was \$1.9 million (2017 \$0.5 million) related to amounts owing by NX Gold.
- 9. Deferred tax expense for the quarter ended December 31, 2018 of \$5.0 million (2017 \$0.9 million recovery) included \$3.8 million (2017 \$0.9 million) at MCSA and \$1.2 million (2017 \$Nil) at NX Gold. The net deferred tax expense increased principally as a result of changes in the estimated taxable temporary differences associated with the fair value adjustments recorded in relation to the initial acquisition of MCSA and NX Gold by the Company.

## **SUMMARY OF QUARTERLY RESULTS**

The following table presents selected financial information for each of the most recent eight quarters. Tabular amounts are in millions of US Dollars, except share and per share amounts.

		2018						2017						
Selected Financial Information	Dec 31 <sup>(1)</sup>	Sept 30 <sup>(2)</sup>	J	June 30 <sup>(3)</sup>	М	larch 31 <sup>(4)</sup>		Dec 31 <sup>(5)</sup>	s	ept 30 <sup>(6)</sup>	J	une 30 <sup>(7)</sup>	М	arch 31 <sup>(8)</sup>
Revenue	\$ 85.1	\$ 47.3	\$	61.0	\$	39.7	\$	49.4	\$	40.9	\$	38.9	\$	19.0
Cost of product sold	\$ (44.7)	\$ (27.9)	\$	(44.2)	\$	(30.8)	\$	(38.5)	\$	(34.1)	\$	(33.3)	\$	(22.1)
Gross profit (loss)	\$ 39.0	\$ 18.8	\$	15.9	\$	8.5	\$	10.3	\$	6.0	\$	5.1	\$	(3.4)
Net income (loss) for period	\$ 11.3	\$ 5.2	\$	(18.2)	\$	(1.3)	\$	19.5	\$	17.9	\$	(12.8)	\$	(7.1)
Income (loss) per share attributable to owners														
of the Company														
- Basic	\$ 0.13	\$ 0.05	\$	(0.22)	\$	(0.02)	\$	0.28	\$	0.32	\$	(0.19)	\$	(0.12)
- Diluted	\$ 0.13	\$ 0.05	\$	(0.22)	\$	(0.02)	\$	0.24	\$	0.29	\$	(0.19)	\$	(0.12)
Weighted average number of common shares														
outstanding - Basic	84,736,476	84,504,954		84,458,914	8	1,974,876	7	0,929,120	5	6,772,684	!	56,772,684	4	0,191,450
- Diluted	89,191,707	88,638,656		88,458,396	8	1,974,876	8	31,448,095	6	3,112,617	ļ	56,772,684	4	0,191,450

Footnotes

Prior quarters have been re-cast to reflect NX Gold as no longer being a discontinued operation.

- 1. During the three-month period ended December 31, 2018, the Company earned gross profit of approximately \$39.0 million from mining operations of which \$33.9 million came from MCSA and its copper operations and \$5.1 million from NX Gold and its gold operations. During the quarter MCSA began commercial production of the Vermelhos mine as well as inventory sitting from the previous quarter in stockpile inventory was sold via export sales. The increased sales generated higher net income for the period.
- 2. During the three-month period ended September 30, 2018, the Company earned gross profit of approximately \$18.8 million from mining operations of which \$15.6 million came from MCSA and its copper operations and \$3.2 million from NX Gold and its gold operations. Overall, net income from for the period was \$5.2 million, which included the gross profit of \$18.8 million and other income of \$2.0 million. These income items were partially offset principally by \$5.9 million in general and administrative expenses, \$0.9 million in share-based compensation expense, \$6.4 million in finance expense, and \$2.5 million in foreign exchange losses. The foreign exchange losses were comprised of a \$2.5 million loss associated with US dollar denominated debt held by MCSA whose functional currency is the Brazilian Real, \$1.5 million loss on foreign exchange forward contracts, partially offset by a \$1.5 million gain related to other exchange losses.

- 3. During the three-month period ended June 30, 2018, the Company earned gross profit of approximately \$15.9 million from mining operations of which \$11.6 million came from MCSA and its copper operations and \$4.3 million from NX Gold and its gold operations. Overall, net loss for the period was \$18.2 million, which included the gross profit of \$15.9 million and other income of \$2.9 million. These income items were principally offset by \$6.1 million in general and administrative expenses, \$0.8 million in share-based compensation expense, \$4.8 million in finance expense, and \$26.4 million in foreign exchange losses. The foreign exchange losses were comprised of \$12.2 million loss associated with US dollar denominated debt held by MCSA whose functional currency is the Brazilian Real, \$11.4 million loss on foreign exchange forward contracts and \$2.8 million related to other operational exchange losses.
- 4. During the three-month period ended March 31, 2018, the Company earned gross profit of approximately \$8.5 million from mining operations of which \$5.0 million came from MCSA and its copper operations and \$3.5 million from NX Gold and its gold operations. Overall, net loss for the period was \$1.3 million, which included the gross profit of \$8.5 million, \$0.9 million of other income from sales of water and insurance proceeds, \$0.6 million of net deferred income tax recoveries and \$0.8 million in foreign exchange gains. These income items were principally offset by \$6.5 in general and administrative expenses, \$0.8 million in share-based compensation expense, and \$4.5 million in finance expense.
- 5. During the three-month period ended December 31, 2017, the Company earned gross profit of approximately \$10.3 million from mining operations of which \$5.3 million came from MCSA and its copper operations and \$5.0 million from NX Gold and its gold operations. Overall net income from operations for the period was \$19.5 million, which included the gross profit of \$10.3 million, a \$28.7 million gain on the successful settlement of certain MCSA debt balances, and \$0.3 million on net income tax recovery. These income items where partially offset principally by \$9.1 million in foreign exchange loss on US dollar denominated debt as the US dollar strengthened compared to the Brazilian Real, \$9.6 million in general and administrative expenses, \$0.6 million in share-based compensation expense, and \$0.7 million in other expenses.
- 6. During the three-month period ended September 30, 2017, the Company earned gross profit of approximately \$6.0 million from mining operations of which \$5.5 million came from MCSA and its copper operations and \$0.5 million from NX Gold and its gold operations. MCSA had a second full quarter of concentrate sales as operations continued to ramp up. Overall net income from operations for the period was \$17.9 million, which included the gross profit of \$6.0 million, \$7.1 million in foreign exchange gains on US dollar denominated debt as the US dollar weakened compared to the Brazilian Real, \$1.3 million of finance income and a \$14.4 million deferred income tax recovery primarily resulting from receipt of approval of MCSA's inclusion in a tax amnesty program previously discussed in this MD&A. These income items were partially offset by \$6.2 million of finance expense, \$4.5 million in general and administrative expenses and \$0.2 million in share-based compensation expense.
- 7. During the three-month period ended June 30, 2017, the Company earned gross profit of approximately \$5.1 million from mining operations of which \$4.9 million came from MCSA and its copper operations and \$0.2 million from NX Gold and its gold operations. MCSA had a full quarter of concentrate sales as operations continued to ramp up. Overall net loss from operations for the period was \$12.8 million, which included \$7.5 million of finance expense, \$3.8 million in general and administrative expenses, \$0.1 in share based compensation expense and \$8.2 million in foreign exchange loss on US dollar denominated debt as the US dollar strengthened compared to the Brazilian Real, partially offset by \$5.1 million from mining operations, \$0.8 million deferred income tax recovery and \$0.9 million in finance and other income.
- 8. During the three-month period ended March 31, 2017, the Company experienced a gross loss of approximately \$3.4 million from mining operations of which \$2.8 million loss came from MCSA and its copper operations and \$0.6 million loss from NX Gold and its gold operations. MCSA's operations at its Vale do Curaçá Property resumed in January of 2017 but sales of copper concentrate did not commence until the latter portion of February 2017. Overall net loss from operations for the period was \$7.1 million, which included the \$3.4 million loss from mining operations, \$7.2 million of finance expense, and \$5.1 million in general and administrative expenses, partially offset by \$5.9 million of foreign exchange gains, primarily on US dollar denominated debt as the US dollar weakened compared to the Brazilian Real and \$2.6 million in finance and other income.

## LIQUIDITY, CAPITAL RESOURCES AND CONTRACTUAL OBLIGATIONS

# Liquidity

As at December 31, 2018, the Company held cash and cash equivalents of \$18.9 million. Cash and cash equivalents are primarily comprised of cash held with reputable financial institutions and are invested in highly liquid short-term investments with maturities of three months or less. The funds are not exposed to liquidity risk and there are no restrictions on the ability of the Company to use these funds to meet its obligations.

Cash and cash equivalents decreased by \$32.2 million during the year ended December 31, 2018. The Company's cash flows from operating, investing and financing activities during the year ended December 31, 2018 are summarized as follows:

- Cash used in investing activities of \$101.0 million, including:
  - \$97.6 million on additions to mineral property, plant and equipment;
  - o \$3.6 million on additions to exploration and evaluation assets;

## net of:

- \$0.2 million of interest received;
- Cash flows used in financing activities of approximately \$9.4 million, including:
  - \$127.4 million on repayment on loans and borrowings;
  - \$11.5 million on payment of interest on loans and borrowings;
  - \$10.7 million of other finance expenses
  - o \$0.8 million move to restricted cash

## net of:

- \$139.4 million proceeds from new loans and borrowings;
- \$1.6 million proceeds from issuance of share capital;

## Partially offset by:

• Cash from operating activities of \$82.9 million.

As at December 31, 2018, the Company had a working capital deficit of \$9.3 million.

The Company does not expect to have any issues with respect to its ability to meet its working capital requirements and to service its debt obligations. The Company expects, based on estimated cash flows including the now operational Vermelhos underground mine, as well as its undrawn lines of credit discussed previously in this MD&A, the Company will be able to meet its working capital requirements and service its debt obligations. The risk to the Company of being unable to service its debt obligations is largely limited to a significant drop in the underlying commodity price.

## **Capital Resources**

The Company's primary sources of capital are comprised of cash from operations, cash and cash equivalents on hand and debt facilities. The Company will continuously monitor its capital structure and, based on changes in operations and economic conditions, may adjust such structure by issuing new common shares or new debt as necessary. While the Company has been successful in securing financing to date, there are no guarantees that it will be able to secure such financing in the future on terms acceptable to the Company, if at all. Taking into consideration cash flow from existing operations, the commissioning of the Vermelhos underground mine in

October 2018, and the existing undrawn line of credit, management believes that the Company has sufficient working capital and financial resources to maintain its planned operations and activities for the foreseeable future.

Certain loan agreements contain operating and financial covenants that could restrict the ability of the Company and its subsidiary, MCSA, to, among other things, incur additional indebtedness needed to fund its respective operations, pay dividends or make other distributions, make investments, create liens, sell or transfer assets or enter into transactions with affiliates. There are no other restrictions or externally imposed capital requirements of the Company.

# **Contractual Obligations and Commitments**

As at December 31, 2018, the Company's contractual obligations and commitments are summarized as follows:

The Company has entered into agreements for the rental of office space that require minimum payments as follows: (amounts in thousands)

2019	64
2020	65
2021	65
2022	27
Total Commitments	\$ 221

## **MANAGEMENT OF RISKS AND UNCERTAINTIES**

The Company thoroughly examines the various financial instruments and risks to which it is exposed and assesses the impact and likelihood of those risks. These risks may include credit risk, liquidity risk, currency risk, commodity price risk and interest rate risk. Where material, these risks are reviewed and monitored by the Board.

## (a) Management of financial risks

The Company is exposed to the following risks arising from financial instruments:

- Credit risk;
- Liquidity risk; and
- Market risk.

## Credit risk

Credit risk is the risk of financial loss to the Company if a customer or counterparty to a financial instrument fails to meet its contractual obligations and arises principally from the Company's receivables from customers. The carrying amount of the financial assets below represents the maximum credit risk exposure as at December 31, 2018 and December 31, 2017:

	Decem	ber 31, 2018	Decer	mber 31, 2017
Cash and cash equivalents	\$	18,941	\$	51,098
Restricted cash		3,000		2,193
Accounts receivable		7,219		2,217
Deposits		1,334		1,955
Other non-current assets - term deposits		686		753
	\$	31,180	\$	58,216

The Company invests cash and cash equivalents as well as restricted cash with financial institutions that are financially sound based on their credit rating. The Company's exposure to credit risk associated with accounts receivable is influenced mainly by the individual characteristics of each customer. The Company currently has only three significant customers, all of which have no history of credit default with the Company. The Company has not incurred significant credit losses in either of the years ended December 31, 2018 and 2017.

## Expected credit losses

The Company has reviewed expected credit losses on trade receivables on transition to IFRS 9 and has implemented a process for managing and estimating provisions relating to trade receivables going forward under IFRS 9. For trade receivables, the Company has applied the simplified approach for determining expected credit losses which requires the determination of lifetime expected losses for all trade receivables. The expected lifetime credit loss provision for trade receivables is based on historical counterparty default rates and adjusted for relevant forward-looking information, when required. As the Company's primary significant customers are considered to have a low default rate and historical default rates are low, the lifetime expected credit loss allowance for trade receivables is nominal as at January 1, 2018 and December 31, 2018. Accordingly, the Company did not record a provision for expected credit losses for trade receivables.

## Liquidity risk

Liquidity risk is the risk associated with the difficulties that the Company may have meeting the obligations associated with financial liabilities that are settled with cash payments or with another financial asset. The Company's approach to liquidity management is to ensure as much as possible that sufficient liquidity exists to meet their maturity obligations on the expiration dates, under normal and stressful conditions, without causing unacceptable losses or with risk of undermining the normal operation of the Company.

The table below shows the Company's maturity of financial liabilities as at December 31, 2018:

	(	Carrying	Co	ntractual	U	p to 12					Мо	re than 5
Non-derivative Financial Liabilities	value		cash flows		months		1-2 years		3-5 years		years	
Loans and borrowings	\$	152,320	\$	156,541	\$	10,602	\$	12,816	\$	127,986	\$	5,137
Interest on loans and borrowings		-		54,801		11,126		8,092		34,678		905
Accounts payable and accrued liabilities		36,390		36,390		36,390		-		-		-
Value added, payroll and other taxes		17,950		17,950		12,674		2,617		2,659		-
	\$	206,660	\$	265,682	\$	70,792	\$	23,525	\$	165,323	\$	6,042

### Market risk

Market risk is the risk of loss that may arise from changes in market factors such as interest rates, foreign exchange rates, and commodity prices. The purpose of market risk management is to manage and control exposures to market risks, within acceptable parameters, while optimizing return.

The Company may use derivatives, including forward contracts and swap contracts, to manage market risks.

## (a) Foreign exchange currency risk

The Company's subsidiaries in Brazil are exposed to exchange risks related to the US dollars and Euros. In order to minimize currency mismatches, the Company monitors its cash flow projections considering future sales expectations indexed to US dollar variation in relation to the cash requirement to settle the existing financings.

The Company's exposure to foreign exchange currency risk at December 31, 2018 relates primarily to \$10.2 million (December 31, 2017 – \$73.2 million) in loans and borrowings of MCSA denominated in US dollars and Euros. Strengthening (weakening) in the Brazilian Real against the US dollar by 10% and 20%, would have increased (decreased) net income by \$0.7 million and \$1.3 million, respectively (2017 –\$7.3 million and \$14.6 million). Strengthening (weakening) in the Brazilian Real against the Euro by 10% and 20%, would have increased (decreased) net income by \$0.4 million and \$0.7 million, respectively (2017 – nil). This analysis is based on the foreign currency exchange variation rate that the Company considered to be reasonably possible at the end of the year. The analysis assumes that all other variables, especially interest rates, are held constant.

At December 31, 2018, the Company has entered into foreign exchange forward contracts to sell an aggregate amount of \$21.5 million U.S. dollars (2017 - \$57.0 million) into Brazilian Real at rates ranging from 3.8900 to 3.9535 (2017 – 3.2673 to 3.3307). The maturity dates of these contracts range from January 2, 2019 to March 29, 2019 and are financially settled on a net basis. The fair value of these contracts at December 31, 2018 was an asset of \$0.3 million, (December 31, 2017 – a liability of \$0.9 million) which has been included in Derivatives in the statement of financial position. The change in fair value of foreign currency contracts was a gain of \$1.1 million for the year ended December 31, 2018 (2017 – a loss of \$0.8 million) has been recognized in foreign exchange loss. In addition, in the year ended December 31, 2018, the Company recognized a realized loss of \$10.1 million (2017 – a gain of \$0.2 million) related to the settlement of foreign currency forward contracts.

# (b) Interest rate risk

The Company is principally exposed to the variation in interest rates on loans and borrowings with variable rates of interest. Management reduces interest rate risk exposure by entering into loans and borrowings with fixed rates of interest or by entering into derivative instruments that fix the ultimate interest rate paid.

The Company is principally exposed to interest rate risk through its Term Facilities of \$123.5 million and Brazilian Real denominated bank loans of \$8.6 million. As at December 31, 2018, the Company did not engage in any hedging or derivative transactions to manage interest rate risk. Subsequent to December 31, 2018, the Company entered into an interest rate swap transaction to manage interest rate risk (see note 10 to the Company's audited consolidated financial statements). Based on the Company's net exposure at December 31, 2018, a reasonably possible change in the variable rates would not have a material impact on profit or equity.

## (c) Price risk

The Company is exposed to price risk with respect to commodity prices related to copper concentrate sales. Commodity price risk is defined as the potential adverse impact on earnings and economic value due to commodity price movements and volatilities. The Company closely monitors copper and gold prices to determine the appropriate course of action to be taken by the Company. The Company's primary exposure related to commodity price risk relates to its sales of copper concentrate, which may be subject to provisional pricing. Accordingly, the related receivables are marked to market on each balance sheet date based on forward price curves until such time as the sales price is fixed. Changes in the forward prices affect the amount of revenue recognized. As at December 31, 2018, the Company had no sales or receivables subject to provisional pricing.

For a discussion of additional risks applicable to the Company and its business and operations, including risks related to the Company's foreign operations, the environment and legal proceedings, see "Risk Factors" in the Company's Annual Information Form for the year ended December 31, 2018 and dated March 14, 2019 (the "AIF").

## OTHER FINANCIAL INFORMATION

# **Off-Balance Sheet Arrangements**

As at December 31, 2018, the Company had no material off-balance sheet arrangements.

## **Contingencies**

With the acquisition of MCSA, the Company inherited certain liabilities and MCSA has been subject to a number of claims (including claims related to tax, labour and social security matters and civil action) in the course of its business which individually are not material and have not been accrued for in the Company's financial statements as it is not probable that a cash outflow will occur. While the Company believes that a significant number of these claims are unlikely to be successful, if all such existing claims were decided against it, the Company could be exposed to liability of up to approximately \$21.9 million, which could have an adverse impact on the Company's business, financial condition, results of operations, cash flows or prospects.

# **Outstanding Share Data**

At March 14, 2019, the Company had 84,938,648 common shares, 5,016,187 stock options, 3,166,662 warrants, and 215,288 performance share units issued and outstanding.

# **Related Party Disclosures**

For the year ended December 31, 2018, amounts paid to related parties were incurred in the normal course of business and measured at the exchange amount, which is the amount agreed upon by the transacting parties and on terms and conditions similar to non-related parties.

Key management personnel consist of the Company's directors and officers and their compensation includes director retainer fees and management salaries paid to these individuals, or companies controlled by these individuals, and share based compensation. The aggregate value of compensation paid to key management personnel for the year ended December 31, 2018 was \$5.4 million (\$3.3 million for the year ended December 31, 2017). In addition, 1,100,155 options were issued to key management personnel with \$2.3 million recognized in share-based compensation expense for the year ended December 31, 2018 (2,453,000 options and \$0.9 million share-based compensation expense for the year ended December 31, 2017).

Key management personnel held certain convertible debentures (note 13) which were converted in the year ended December 31, 2018 into 1,476,164 common shares and 369,040 common share purchase warrants. The warrants were subsequently exercised into 369,040 common shares. Key management personnel exercised a total of 133,000 options during the year ended December 31, 2018 (919,996 warrants were exercised for the year ended December 31, 2017). During the year ended December 31, 2017, key management personnel participated in certain financing activities by purchasing 233,333 common shares of the Company for total proceeds of \$0.4 million and by subscribing to \$1.0 million of the convertible debentures.

## **ACCOUNTING POLICIES, JUDGMENTS AND ESTIMATES**

## **Critical Accounting Judgments and Estimates**

The preparation of consolidated financial statements in conformity with IFRS requires management to make judgments, estimates and assumptions about future events that affect the reported amounts of assets and liabilities at the date of the financial statements and the reported amounts of revenue and expenses during the reporting period. Although these estimates are based on management's best knowledge of the amount, events or actions, actual results may differ from these estimates.

The Company's significant accounting policies and accounting estimates are contained in the Company's December 31, 2018 consolidated financial statements. Certain of these policies, such as, capitalization and depreciation of property, plant and equipment and mining interests, derivative instruments, and decommissioning liabilities provisions involve critical accounting estimates because they require management of the Company to make subjective or complex judgments about matters that are inherently uncertain, and because of the likelihood that materially different amounts could be reported under different conditions or using different assumptions.

In preparing its financial statements, management has made judgments, estimates and assumptions that affect the application of the Company's accounting policies and the reported amounts of the assets, liabilities, revenues and expenses. Actual results may differ from these estimates.

The estimates and assumptions are reviewed on an ongoing basis. Revisions to estimates are recognized prospectively.

## **Critical Judgments**

# Going concern

The preparation of these consolidated financial statements requires management to make judgments regarding its ability to continue as a going concern as discussed in Note 1 of the audited consolidated financial statements as at December 31, 2018.

## Functional currency

The functional currency of the Company and each of its subsidiaries is the currency of the primary economic environment in which the entities operate. The Company has determined that the functional currency for the Company is the US dollar while the functional currency for MCSA and NX Gold is the Brazilian Real. Assessment of functional currency involves certain judgements to determine the primary economic environment and the Company reconsiders the functional currency of its entities if there is a change in events and conditions which determined the primary economic environment.

## **Key Sources of Estimation Uncertainty**

## Impairment of property, plant and equipment

The Company evaluates each asset or cash generating unit every reporting period to determine whether there are any indications of impairment. If any such indication exists, which is often judgmental, a formal estimate of recoverable amount is performed, and an impairment loss is recognized to the extent that the carrying amount exceeds the recoverable amount. The recoverable amount of an asset or cash generating group of assets is measured at the higher of fair value less costs to sell and value in use. The evaluation of asset carrying values for indications of impairment includes consideration of both external and internal sources of information, including such factors as market and economic conditions, production budgets and forecasts, and life-of-mine estimates.

When required, the determination of fair value and value in use requires management to make estimates and assumptions about expected production, sales volumes, commodity prices, mineral reserves, operating costs, closure and rehabilitation costs and future capital expenditures. The estimates and assumptions are subject to risk and uncertainty; hence, there is the possibility that changes in circumstances will alter these projections, which may impact the recoverable amount of the assets. In such circumstances, some or all of the carrying value

of the assets may be further impaired or the impairment charge reduced with the impact recorded in profit or loss.

Mineral reserve and resource estimates including life of mine plan

The Company estimates its mineral reserves and mineral resources based on information compiled by competent individuals. Mineral reserves are used in the calculation of depreciation, impairment assessments and for forecasting the timing of payment of mine closure and rehabilitation costs.

There are numerous uncertainties inherent in estimating mineral reserves, and assumptions that are valid at the time of estimation may change significantly when new information becomes available. Changes in the estimation methodology, forecasted prices of commodities, exchange rates, production costs or recovery rates may change the economic status of mineral reserves and may, ultimately, result in changes in the mineral reserves.

The carrying amounts of the Company's mineral properties, plant and equipment are depleted in part based on recoverable mineral reserve tonnes processed, depending on the use of the asset. Changes to estimates of recoverable quantities of metals, mineral reserve tonnes and depletable costs, including changes resulting from revisions to the Company's mine plans and changes in metals prices forecasts, can result in a change to future depreciation and depletion rates and may result in impairment charges.

## Mine closure and rehabilitation costs

Significant estimates and assumptions are made in determining the provision for mine closure and rehabilitation as there are numerous factors that will affect the ultimate liability payable. These factors include estimation of the extent and cost of rehabilitation activities, timing of future cash flows, discount rates, inflation rate, and regulatory requirements.

Changes in the above factors can result in a change to the provision recognized by the Company. Changes to mine closure and rehabilitation costs are recorded with a corresponding change to the carrying amounts of related mineral properties, plant and equipment. Adjustments to the carrying amounts of related mineral properties, plant and equipment can result in a change to future depreciation and depletion expense.

Significant assumptions used to determine mine closure and rehabilitation costs are included in Note 12(a) of the audited consolidated financial statements as at December 31, 2018.

## Inventory

The net recoverable value of stockpile inventory and production in work in progress inventory is based on the quantity of recoverable metal inventory which is an estimate based on the tons of ore added and removed from the process, expected grade and recovery rates. The quantity of recoverable metal in finished concentrate inventory is an estimate based on initial weights and assay results. The net recoverable value of these inventories also requires estimates of expected selling prices and, where applicable, costs to complete.

## Fair value of embedded derivatives

The value of trade receivables from the sale of copper concentrate is measured using quoted forward market prices as at the balance sheet date that correspond to the settlement date of the provisional pricing period for the estimated metals contained within the concentrate. Fluctuations in the underlying market prices of copper, silver and gold, metal content and concentrate weight can cause significant changes to the ultimate final

settlement value of the receivables and the final revenue recorded can vary significantly as a result.

## Income taxes

The determination of the Company's tax expense for the period and deferred tax assets and liabilities involves significant estimation and judgement by management. In determining these amounts, management interprets tax legislation in a variety of jurisdictions and makes estimates of the expected timing of the reversal of deferred tax assets and liabilities. Management also makes estimates of future earnings, which affect the extent to which potential future tax benefits may be used. The Company is subject to assessments by various taxation authorities, which may interpret legislation differently. These differences may affect the final amount or the timing of the payment of taxes. The Company provides for such differences where known based on management's best estimate of the probable outcome of these matters.

# Measurement of fair value

A number of the Company's accounting policies and disclosures require the measurement of fair values, for both financial and non-financial assets and liabilities.

When measuring the fair value of an asset or liability, the Company uses observable market data, as much as possible. Fair values are classified into different levels in a hierarchy based on the inputs used in the valuation techniques, as follows:

- Level 1: quoted prices (without adjustments) in active markets for identical assets or liabilities.
- Level 2: inputs other than Level 1 quoted prices, that are observable for the asset or liability, either directly (i.e. as prices) or indirectly (i.e. derived from prices).
- Level 3: inputs, for assets or liabilities, that are not based on observable market information (non-observable inputs).

The Company recognizes transfers between levels of the hierarchy of fair value at the end of the reporting period during which the change occurred.

When applicable, additional information on the assumptions used in the fair value calculations are disclosed in the specific notes of the corresponding asset or liability.

## **New Accounting Standards Adopted in the Current Period**

The following new and amended IFRS pronouncements were adopted effective January 1, 2018:

i) IFRS 15 Revenue from Contracts with Customers

IFRS 15, Revenue from Contracts with Customers ("IFRS 15") replaces IAS 11 Construction Contracts, IAS 18 Revenue, IFRIC 13 Customer Loyalty Programs, IFRIC 15 Agreements for the Construction of Real Estate, IFRIC 18 Transfer of Assets from Customers, and SIC 31 Revenue – Barter Transactions Involving Advertising Services.

The standard contains a single model that applies to contracts with customers and two approaches to recognizing revenue: at a point in time or over time. The model features a contract-based five-step analysis of transactions to determine whether, how much and when revenue is recognized. New estimates and judgmental thresholds have been introduced, which may affect the amount and/or timing of revenue

recognized. The new standard applies to contracts with customers. It does not apply to insurance contracts, financial instruments or lease contracts, which fall in the scope of other IFRSs.

Adoption of IFRS 15 by the Company on January 1, 2018 did not have a material impact on our consolidated financial statements. The Company's accounting policy for revenue recognition, which is disclosed in the Note 3(a) to our consolidated annual financial statements for the year ended December 31, 2018, has been updated to reflect the requirements of IFRS 15.

## ii) IFRS 9 Financial Instruments

IFRS 9, Financial Instruments ("IFRS 9") replaces IAS 39, Financial Instruments: Recognition & Measurement ("IAS 39") and introduces new requirements for the classification and measurement of financial assets. Under IFRS 9, financial assets are classified and measured based on the business model in which they are held and the characteristics of their contractual cash flows. The standard also introduces additional changes relating to financial liabilities, amends the impairment model by introducing a new 'expected credit loss' model for calculating impairment and introduces a new general hedge accounting standard which aligns hedge accounting more closely with risk management. For financial liabilities, the standard retains most of the IAS 39 requirements. The main change is that, in cases where the fair value option is taken for financial liabilities, the part of a fair value change relating to the Company's own credit risk is recorded in other comprehensive income rather than in profit or loss, unless this creates an accounting mismatch.

The Company and its subsidiaries adopted IFRS 9 on January 1, 2018 retrospectively without restatement of comparative periods in accordance with the transitional provisions of the standard.

The Company has assessed the classification and measurement of its financial assets and financial liabilities under IFRS 9 and have summarized the original measurement categories under IAS 39 and the new measurement categories under IFRS 9 in the following table:

	Measurement Category							
	Original (IAS 39)	New (IFRS 9)						
Financial Assets:								
Cash, cash equivalents and restricted cash	Amortized cost	Amortized cost						
Trade receivables	Amortized cost	Amortized cost						
Deposits	Amortized cost	Amortized cost						
Other non-current assets - term deposits	Amortized cost	Amortized cost						
Financial Liabilities:								
Trade payables	Amortized cost	Amortized cost						
Loans and borrowings	Amortized cost	Amortized cost						
Derivatives	Fair value through profit or loss	Fair value through profit or loss						

There has been no change in the carrying value of the Company's financial instruments or to previously reported figures as a result of changes to the measurement categories in the table noted above.

Further information regarding the adoption of IFRS 9, and the new Company's new accounting policies for financial instruments, is disclosed in the Note 2(e) and Note 3(i) to our consolidated annual financial statements for the year ended December 31, 2018.

## Future Changes in Accounting Policies Not Yet Effective as at December 31, 2018

New standards and amendments to standards are effective for annual periods beginning after January 1, 2018. The standards that may have a significant impact on the consolidated financial statements are as follows:

## i) IFRS 16 Leases

On January 13, 2016, the IASB issued IFRS 16 *Leases* ("IFRS 16"). The new standard is effective for the Company on January 1, 2019. Earlier application is permitted for entities that apply IFRS 15 *Revenue from Contracts with Customers* at or before the date of initial adoption of IFRS 16. IFRS 16 will replace IAS 17 *Leases*.

This standard introduces a single lessee accounting model and requires a lessee to recognize assets and liabilities for all leases with a term of more than 12 months, unless the underlying asset is of low value. A lessee is required to recognize a right-of-use asset representing its right to use the underlying asset and a lease liability representing its obligation to make lease payments.

This standard substantially carries forward the lessor accounting requirements of IAS 17, while requiring enhanced disclosures to be provided by lessors. Other areas of the lease accounting model have been impacted, including the definition of a lease. Transitional provisions have been provided.

During 2018, we compiled all of our existing operating leases and service contracts and reviewed the relevant agreements to identify which of the operating leases and service contracts are in scope for IFRS 16. In addition, we completed our review of existing service contracts for embedded leases and had identified all operating leases. In the fourth quarter of 2018, we began developing a valuation approach to discount our population of leases and reviewed the increased accounting and disclosure requirements arising from the new leasing standard.

Upon adoption of IFRS 16, the Company will record new right of use assets and associated lease liabilities related to leases with a term of 12 months or more on the consolidated statement of financial position at January 1, 2019. Due to the recognition of additional right of use assets and lease liabilities, a higher amount of depreciation expense and interest expense on lease liabilities will be recognized under IFRS 16 as compared to the current standard. This impact will be partially offset by a reduction in operation lease expense payments currently included in cost of product sold and/or general and administrative expenses.

While the Company has not yet completed the quantification of the impact that adoption of IFRS 16 will have, our expectation is that most of the impact upon transition to IFRS 16 will be derived from our operating leases and certain contractual arrangements associated with the use of machinery and equipment, which will be recognized on our balance sheet effective January 1, 2019. We will use the modified retrospective approach of adoption resulting in no restatement of prior year comparatives. The quantitative impact of adopting IFRS 16 will be provided in our first interim financial statements in 2019.

## ii) IFRIC 23 – Uncertainty over Income Tax Treatments

On June 7, 2017, the IASB issued IFRIC Interpretation 23 ("Interpretation 23") – *Uncertainty over Income Tax Treatments*. The Interpretation provides guidance on the accounting for current and deferred tax liabilities and assets in circumstances in which there is uncertainty over income tax treatments. Interpretation 23 is applicable for annual periods beginning on or after January 1, 2019. The Company intends to adopt Interpretation 23 in its financial statements for the annual period beginning on January 1, 2019 and does not expect it to have a material impact on the financial statements.

# **Local Currency Operating Metrics – Presented in Brazilian Real**

		2018 - Q4 <sup>(2)</sup>	2017 - Q4 <sup>(1)</sup>	<b>2018</b> <sup>(2)</sup>	2017 (1)
Costs (MCSA Operations)					
Mining - UG (Pilar)	R\$	63,863	\$ 39,109	\$ 201,948	\$ 120,701
- UG (Vermelhos)		19,288	n/a	19,288	n/a
- OP		16,894	10,504	62,867	44,496
Processing <sup>(3)</sup>		23,058	15,483	70,583	54,860
Indirect <sup>(3)</sup>		10,783	5,001	30,058	19,680
Production costs		133,886	70,097	384,744	239,737
Capex development		(27,815)	(7,598)	(68,705)	(21,032)
By-product credits		(11,090)	(3,802)	(28,310)	(13,265)
Treatment, refining and other		(2,676)	n/a	(1,772)	n/a
C1 Cash Costs	R\$	92,305	\$ 58,697	\$ 285,957	\$ 205,440
Breakdown Mined and Processed (tonnes)					
UG Mined		687,872	292,558	1,836,455	965,626
OP Mined		700,732	1,130,505	4,096,723	3,508,430
Total Mined (t):		1,388,604	1,423,063	5,933,178	4,474,056
Total Processed (t)		777,480	452,371	2,257,917	1,771,209
Cu Production (t)		12,104	5,334	30,426	20,133
UG Mining - R\$/tonne mined		120.88	133.68	120.47	125.00
OP Mining - R\$/tonne mined		24.11	9.29	15.35	12.68
Processing -R\$/S tonne processed <sup>(3)</sup>		29.66	34.23	31.26	30.97
Indirect -R\$/S tonne processed <sup>(3)</sup>		13.87	11.06	13.31	11.11

#### **Footnotes**

- [1] Ero was incorporated on May 16, 2016. MCSA was acquired December 12, 2016. Operations did not commence until 1st quarter of 2017.
- [2] Starting 2018 in its computation of C1 Cash costs, Ero is including the costs of treatment, refinement and other costs and credits associated with selling concentrate to customers.
- [3] Processing and indirect unit costs includes the contribution of gallery development and trial mining of the newly constructed Vermelhos underground mine during Q3.

## **NON-IFRS MEASURES**

Financial results of the Company are prepared in accordance with IFRS. The Company utilizes certain non-IFRS measures, including C1 cash cost of copper produced (per lb), C1 cash cost of gold produced (per ounce), EBITDA, Adjusted EBITDA, Adjusted net income (loss) attributable to owners of the Company, Adjusted earnings (loss) per share, net debt and working capital, which are not measures recognized under IFRS. The Company believes that these measures, together with measures determined in accordance with IFRS, provide investors with an improved ability to evaluate the underlying performance of the Company. Non-IFRS measures do not have any standardized meaning prescribed under IFRS, and therefore they may not be comparable to similar measures employed by other companies. The data is intended to provide additional information and should not be considered in isolation or as a substitute for measures of performance prepared in accordance with IFRS. The tables below provide a reconciliation of these non-IFRS measures to the most directly comparable IFRS measures as contained in the Company's financial statements.

Unless otherwise noted, the non-IFRS measures presented below have been calculated on a consistent basis for the periods presented.

# C1 Cash Cost of Copper Produced (per lb)

C1 Cash cost of copper produced (per lb) is the sum of production costs (excluding the capitalized pre-production mining costs at Vermelhos), net of capital expenditure development costs and by-product credits, divided by the copper pounds produced. C1 cash costs reported by the Company include treatment, refining charges, offsite costs, and certain tax credits relating to sales invoiced to the Company's Brazilian customer on sales. By-product credits are calculated based on actual precious metal sales (net of treatment costs) during the period divided by the total pounds of copper produced during the period. C1 cash cost of copper produced per pound is a non-IFRS measure used by the Company to manage and evaluate operating performance of the Company's operating mining unit and is widely reported in the mining industry as benchmarks for performance but does not have a standardized meaning and is disclosed in addition to IFRS measures.

The following table provides a reconciliation of C1 cash cost of copper produced per pound to cost of goods sold, its most directly comparable IFRS measure.

	2018 - Q4 <sup>(2)</sup>	2017 - Q4 <sup>(1)</sup>	<b>2018</b> <sup>(2)</sup>	2017 <sup>(1)</sup>
Costs				
Mining	\$ 28,045	\$ 15,165	\$ 79,046	\$ 51,756
Processing <sup>(3)</sup>	6,052	5,540	19,167	17,188
Indirect <sup>(3)</sup>	2,830	927	8,134	6,166
Production costs	36,927	21,632	106,347	75,110
Capex development	(7,301)	(2,374)	(18,530)	(6,589)
By-product credits	(2,911)	(1,173)	(7,607)	(4,156)
Treatment, refining and other	(263)	n/a	(705)	n/a
C1 Cash Costs	\$ 26,452	\$ 18,085	\$ 79,505	\$ 64,365
Costs per pound				
Payable copper produced (lb) <sup>(4)</sup>	26,685	11,760	67,077	44,385
Mining	\$ 1.05	\$ 1.29	\$ 1.18	\$ 1.17
Processing <sup>(3)</sup>	0.23	0.47	0.29	0.39
Indirect <sup>(3)</sup>	0.11	0.08	0.12	0.14
Capex development	(0.27)	(0.20)	(0.28)	(0.15)
By-product credits	(0.11)	(0.10)	(0.11)	(0.09)
Treatment, refining and other	(0.04)	n/a	(0.01)	n/a
C1 Cash Cost of Copper produced (per lb)	\$ 0.99	\$ 1.54	\$ 1.19	\$ 1.45

### **Footnotes**

- [1] Ero was incorporated on May 16, 2016. MCSA was acquired December 12, 2016. Operations did not commence until 1st quarter of 2017.
- [2] Starting 2018 in its computation of C1 Cash costs, Ero is including the costs of treatment, refinement and other costs and credits associated with selling concentrate to customers.
- [3] Processing and indirect unit costs includes the contribution of gallery development and trial mining of the newly constructed Vermelhos underground mine.
- [4] Total includes amount produced from the newly constructed Vermelhos underground mine as of 2018 Q4 and pre-production ore.

The following table provides a reconciliation of C1 cash cost of copper produced per pound to cost of goods sold, its most directly comparable IFRS measure.

	2018 - Q4 <sup>(2)</sup>	2017 - Q4	<b>2018</b> <sup>(2)</sup>	2017 <sup>(1)</sup>
Reconciliation:				
Cost of Product Sold	\$ 36,894 \$	31,453 \$	115,346	\$ 100,282
Add (less):				
Depreciation/amortization/depletion	(9,244)	(10,818)	(34,104)	(32,672)
Net Change in Inventory	(1,204)	(424)	1,491	1,009
Transportation costs & other	1,019	356	3,083	1,738
By-product credits	(2,911)	(1,173)	(7,607)	(4,156)
Treatment, refining, and other	(263)	n/a	(705)	n/a
Foreign exchange translation adjustments	2,161	(1,309)	2,001	(1,836)
C1 Cash costs	\$ 26,452 \$	18,085 \$	79,505	\$ 64,365

#### **Footnotes**

- [1] Ero was incorporated on May 16, 2016. MCSA was acquired December 12, 2016. Operations did not commence until 1st quarter of 2017.
- [2] Starting 2018 in its computation of C1 Cash costs, Ero is including the costs of treatment, refinement and other costs and credits associated with selling concentrate to customers.

# C1 Cash Cost of Gold produced (per ounce)

C1 Cash cost of gold produced (per ounce) is the sum of production costs, net of capital expenditure development costs and silver by-product credits, divided by the gold ounces produced. By-product credits are calculated based on actual precious metal sales during the period divided by the total ounces of gold produced during the period. C1 cash cost of gold produced per pound is a non-IFRS measure used by the Company to manage and evaluate operating performance of the Company's operating mining unit and is widely reported in the mining industry as benchmarks for performance but does not have a standardized meaning and is disclosed in addition to IFRS measures.

	2018 - Q4	2017 - Q4 <sup>(1)</sup>	2018	2017 (1)
Costs				
Mining	\$ 3,033	\$ 2,770	\$ 11,958	\$ 10,791
Processing	1,944	1,913	7,290	7,729
Indirect	668	624	2,541	2,543
Production costs	5,645	5,308	21,789	21,064
Capex development	(145)	(223)	(695)	(804)
By-product credits	(90)	(81)	(354)	(293)
C1 Cash Costs	\$ 5,410	\$ 5,003	\$ 20,740	\$ 19,967
Costs per ounce				
Payable gold produced (ounces) <sup>(4)</sup>	10,008	8,531	39,808	25,287
Mining	300	325	300	427
Processing	190	224	183	306
Indirect	70	73	64	101
Capex development	(10)	(26)	(17)	(32)
By-product credits	(10)	(10)	(10)	(12)
C1 Cash Cost of Gold produced (per ounce)	\$ 540	\$ 586	\$ 520	\$ 790

### Footnotes

[1] - Ero was incorporated on May 16, 2016. NX Gold was acquired December 12, 2016.

The following table provides a reconciliation of C1 cash cost of gold produced per ounce to cost of goods sold, its most directly comparable IFRS measure.

	2018 - Q4 <sup>(2)</sup>	2017 - Q4	2018 (2)	2017 (1)
Reconciliation:				
Cost of Product Sold	\$ 7,768 \$	7,048 \$	32,265	\$ 27,727
Add (less):				
Depreciation/amortization/depletion	(1,810)	(288)	(11,084)	(5,414)
Net Change in Inventory	(308)	(152)	-	(1,040)
Transportation costs & other	-	21	-	21
By-product credits	(90)	(81)	(354)	(293)
Foreign exchange translation adjustments	(150)	(1,545)	(87)	(1,034)
C1 Cash costs	\$ 5,410 \$	5,003 \$	20,740	\$ 19,967

#### **Footnotes**

- [1] Ero was incorporated on May 16, 2016. MCSA was acquired December 12, 2016. Operations did not commence until 1st quarter of 2017.
- [2] Starting 2018 in its computation of C1 Cash costs, Ero is including the costs of treatment, refinement and other costs and credits associated with selling concentrate to customers.

# Earnings before interest, taxes, depreciation, and amortization ('EBITDA') and Adjusted EBITDA

EBITDA represents earnings before interest expense, income taxes, depreciation, and amortization. Adjusted EBITDA includes further adjustments for non-recurring items and items not indicative to the future operating performance of the Company. The Company believes EBITDA and adjusted EBITDA are appropriate supplemental measures of debt service capacity and performance of its operations.

Adjusted EBITDA is calculated by removing the following income statement items:

- Gains or losses on debt settlement
- Foreign exchange gain (loss)

	2	2018 - Q4	2017 - Q4	2018	2017 <sup>(1)</sup>
Reconciliation:					
Net income (loss)	\$	11,280	\$ 19,482	\$ (2,991) \$	17,484
Adjustments:					
Finance expenses		6,776	(98)	22,562	20,709
Taxes		6,852	(347)	5,652	(15,510)
Depreciation/amortization/depletion		15,301	15,620	45,297	38,141
EBITDA		40,209	34,657	70,520	60,824
Foreign exchange loss (gain) on USD denominated debt		(4,835)	7,655	9,808	3,475
Foreign exchange loss (gain) on realized derivative contracts		965	(296)	10,119	(191)
Foreign exchange loss (gain) on unrealized derivative contracts		(3,993)	1,410	(1,137)	782
Other foreign exchange loss (gain)		430	350	1,923	230
Loss (gain) on debt settlement		5,476	(28,727)	5,476	(28,727)
Share based compensation		723	597	3,225	879
Adjusted EBITDA	\$	38,975	\$ 15,646	\$ 99,934 \$	37,272

### Footnotes

[1] - Ero was incorporated on May 16, 2016. MCSA and NX Gold was acquired December 12, 2016. Operations at MCSA did not commence until 1st quarter of 2017.

# Adjusted net income (loss) attributable to owners of the Company and Adjusted earnings (loss) per share

The Company uses the financial measure "Adjusted net income (loss) attributable to owners of the Company" and "Adjusted earnings (loss) per share" to supplement information in its consolidated financial statements. The Company believes that, in addition to conventional measures prepared in accordance with IFRS, the Company and certain investor and analysts use this information to evaluate the Company's performance. The Company excludes certain unrealized foreign exchange gains or losses from net earnings to provide a measure which allows the Company and investors to evaluate the operating results of the underlying core operations. The presentation of Adjusted EPS is not meant to substitute the EPS presented in accordance with IFRS, but rather it should be evaluated in conjunction with such IFRS measures.

The following table provides a detailed reconciliation of net income (loss) attributable to owners of the Company as reported in the Company's consolidated financial statements to adjusted net income (loss) attributable to owners of the Company and adjusted EPS.

	2018 - Q4	2017 - Q4	2018	2017 <sup>(1)</sup>
Reconciliation:				
Net income (loss) as reported attributable to the owners of the Company	\$ 11,210	\$ 18,400	\$ (3,155)	\$ 22,466
Adjustments for:				
Unrealized foreign exchange loss (gain) on USD denominated debt in MCSA	(4,816)	7,624	9,769	3,305
Unrealized foreign exchange loss (gain) on unrealized derivative contracts	(3,977)	1,404	(1,132)	779
Loss (gain) on debt settlement	5,461	(28,727)	5,461	(28,727)
Adjusted net income (loss) attributed to owners of the Company	7,878	(1,299)	10,943	(2,177)
Weighted average number of common shares - basic	84,736,476	70,929,120	83,927,977	56,252,358
Weighted average number of common shares - diluted	89,191,707	81,448,095	88,072,324	66,003,387
Adjusted earnings (loss) per share - basic	\$ 0.09	\$ (0.02)	\$ 0.13	\$ (0.04)
Adjusted earnings (loss) per share - diluted	\$ 0.09	\$ (0.02)	\$ 0.12	\$ (0.03)

### Footnotes

## **Net Debt**

Net debt is determined based on cash and cash equivalents, restricted cash and loans and borrowings as reported in the Company's consolidated financial statements. The Company uses net debt as a measure of the Company's ability to pay down its debt. The following table provides a calculation of net debt based on amounts presented in the Company's consolidated financial statements as at December 31, 2018 and December 31, 2017.

	December 31	December 31,
	2018	2017
Cash and cash equivalents	\$ 18,941 \$	51,098
Restricted cash	3,000	2,193
Less: Current portion of loans and borrowings	(10,602)	(5,601)
Long-term portion of loans and borrowings	(141,632)	(133,565)
Net Debt	\$ (130,293) \$	(85,875)

<sup>[1] -</sup> Ero was incorporated on May 16, 2016. MCSA and NX Gold was acquired December 12, 2016. Operations at MCSA did not commence until 1st quarter of 2017.

## **Working Capital**

Working capital is determined based on current assets and current liabilities as reported in the Company's consolidated financial statements. The Company uses working capital as a measure of the Company's short-term financial health and operating efficiency. The following table provides a calculation of working capital based on amounts presented in the Company's consolidated financial statements as at December 31, 2018 and December 31, 2017.

	December 31	December 31,		
	2018		2017	
Current Assets	\$ 50,954	\$	97,892	
Less: Current Liabilities	(60,265)		(55,332)	
Working Capital (Deficit)	\$ (9,311)	\$	42,560	

# **Internal Control over Financial Reporting**

The Company's management, under the supervision of the Chief Executive Officer ("CEO") and the Chief Financial Officer ("CFO"), has evaluated the design and effectiveness of the Company's disclosure controls and procedures. Based on this evaluation, the CEO and CFO have concluded that the Company's disclosure controls and procedures were effective as of December 31, 2018.

The Company's management, under the supervision of the CEO and CFO, has evaluated the design and effectiveness of the Company's internal controls over financial reporting ("ICFR") based on the criteria established within the 2013 COSO framework. Based on this evaluation, the CEO and CFO have concluded that the Company's ICFR were effective as of December 31, 2018.

The CEO and CFO acknowledge responsibility for the design of ICFR and confirm that there were no changes in these controls that occurred during the year ended December 31, 2018, which materially affected, or are reasonably likely to materially affect, the Company's ICFR.

## NOTE REGARDING SCIENTIFIC AND TECHNICAL INFORMATION

Unless otherwise indicated, Ero has prepared the technical information in this MD&A ("Technical Information") based on information contained in the report entitled "2017 Updated Mineral Resources and Mineral Reserves Statements of Mineração Caraíba's Vale do Curaçá Mineral Assets, Curaçá Valley", dated September 7, 2017 with an effective date of June 1, 2017, prepared by Rubens Mendonça, MAusIMM, formerly of SRK Consultores do Brasil Ltda. (now with Planminas – Projectos e Consultoria em Mineração Ltda.), and Porfirio Cabaleiro Rodrigues, MAIG, Mário Conrado Reinhardt, MAIG, Fábio Valério Xavier, MAIG, and Bernardo H.C. Viana, MAIG, all of GE21 Consultoria Mineral (the "Vale do Curaçá Technical Report"). The Vale do Curaçá Technical Report was prepared by or under the supervision of a qualified person (a "Qualified Person") as defined in National Instrument 43-101 – Standards of Disclosure for Mineral Projects ("NI 43-101").

The disclosure of Technical Information in this MD&A, including sampling procedures and monthly mass balance data underlying the information contained therein, was reviewed and approved by Rubens Mendonça, a Qualified Person under NI 43-101.

# **Cautionary Note Regarding Forward-Looking Statements**

This MD&A contains "forward-looking information" within the meaning of applicable Canadian securities laws. Forward-looking information includes statements that use forward-looking terminology such as "may", "could", "would", "will", "should", "intend", "target", "plan", "expect", "budget", "estimate", "forecast", "schedule", "anticipate", "believe", "continue", "potential", "view" or the negative or grammatical variation thereof or other

variations thereof or comparable terminology. Such forward-looking information includes, without limitation, statements with respect to the Company's intention to dispose of NX Gold, expected operations at the Pilar Mine, timing of commercial production at the Vermelhos Mine, drilling plans, plans for the Company's electromagnetic survey, the Company's ability to service its ongoing obligations, the Company's future capital resources and the impact of new accounting standards and amendments on the Company's financial statements.

Forward-looking information is not a guarantee of future performance and is based upon a number of estimates and assumptions of management in light of management's experience and perception of trends, current conditions and expected developments, as well as other factors that management believes to be relevant and reasonable in the circumstances, as of the date of this MD&A including, without limitation, assumptions about: favorable equity and debt capital markets; the ability to raise any necessary additional capital on reasonable terms to advance the production, development and exploration of the Company's properties and assets; future prices of copper and other metal prices; the timing and results of exploration and drilling programs; the accuracy of any mineral reserve and mineral resource estimates; the geology of the Vale do Curaçá Property and the Boa Esperança Property being as described in the technical reports for these properties; production costs; the accuracy of budgeted exploration and development costs and expenditures; the price of other commodities such as fuel; future currency exchange rates and interest rates; operating conditions being favorable such that the Company is able to operate in a safe, efficient and effective manner; political and regulatory stability; the receipt of governmental, regulatory and third party approvals, licenses and permits on favorable terms; obtaining required renewals for existing approvals, licenses and permits on favorable terms; requirements under applicable laws; sustained labor stability; stability in financial and capital goods markets; availability of equipment; positive relations with local groups and the Company's ability to meet its obligations under its agreements with such groups; and satisfying the terms and conditions of the Company's current loan arrangements. While the Company considers these assumptions to be reasonable, the assumptions are inherently subject to significant business, social, economic, political, regulatory, competitive and other risks and uncertainties, contingencies and other factors that could cause actual actions, events, conditions, results, performance or achievements to be materially different from those projected in the forward-looking information. Many assumptions are based on factors and events that are not within the control of the Company and there is no assurance they will prove to be correct.

Furthermore, such forward-looking information involves a variety of known and unknown risks, uncertainties and other factors which may cause the actual plans, intentions, activities, results, performance or achievements of the Company to be materially different from any future plans, intentions, activities, results, performance or achievements expressed or implied by such forward-looking information. Such risks include, without limitation the risk factors listed under the heading "Risk Factors" in the AIF.

Although the Company has attempted to identify important factors that could cause actual actions, events, conditions, results, performance or achievements to differ materially from those described in forward-looking information, there may be other factors that cause actions, events, conditions, results, performance or achievements to differ from those anticipated, estimated or intended.

The Company cautions that the foregoing lists of important assumptions and factors are not exhaustive. Other events or circumstances could cause actual results to differ materially from those estimated or projected and expressed in, or implied by, the forward-looking information contained herein. There can be no assurance that forward-looking information will prove to be accurate, as actual results and future events could differ materially from those anticipated in such information. Accordingly, readers should not place undue reliance on forward-looking information.

Forward-looking information contained herein is made as of the date of this MD&A and the Company disclaims any obligation to update or revise any forward-looking information, whether as a result of new information, future events or results or otherwise, except as and to the extent required by applicable securities laws.

## **Cautionary Notes Regarding Mineral Resource and Reserve Estimates**

In accordance with applicable Canadian securities regulatory requirements, all mineral reserve and mineral resource estimates of the Company disclosed or incorporated by reference in this press release have been prepared in accordance with National Instrument 43-101, Standards of Disclosure for Mineral Projects ("NI 43-101") and are classified in accordance with the Canadian Institute of Mining, Metallurgy and Petroleum ("CIM") Definition Standards for Mineral Resources and Mineral Reserves, adopted by the CIM Council on May 10, 2014 (the "CIM Standards").

Mineral resources which are not mineral reserves do not have demonstrated economic viability. Pursuant to the CIM Standards, mineral resources have a higher degree of uncertainty than mineral reserves as to their existence as well as their economic and legal feasibility. Inferred mineral resources, when compared with Measured or Indicated mineral resources, have the least certainty as to their existence, and it cannot be assumed that all or any part of an Inferred mineral resource will be upgraded to an Indicated or Measured mineral resource as a result of continued exploration. Pursuant to NI 43-101, Inferred mineral resources may not form the basis of any economic analysis. Accordingly, readers are cautioned not to assume that all or any part of a mineral resource exists, will ever be converted into a mineral reserve, or is or will ever be economically or legally mineable or recovered.

## ADDITIONAL INFORMATION

Additional information about Ero and its business activities, including the AIF, is available under the Company's profile at www.sedar.com.