lundin mining

Chapada Mine Site Visit November 9, 2019

TSX: LUN Nasdaq Stockholm: LUMI

Cautionary Statements

Caution Regarding Forward-Looking Information and Non-GAAP Performance Measures

Certain of the statements made and information contained herein is "forward-looking information" within the meaning of applicable Canadian securities laws. All statements other than statements of historical facts included in this document constitute forward-looking information, including but not limited to statements regarding the Company's plans, prospects and business strategies; the Company's guidance on the timing and amount of future production and its expectations regarding the results of operations; expected costs; permitting requirements and timelines; timing and possible outcome of pending litigation; the results of any Preliminary Economic Assessment, Feasibility Study, or Mineral Resource and Mineral Reserve estimations, life of mine estimates, and mine and mine closure plans; anticipated market prices of metals, currency exchange rates, and interest rates; the development and implementation of the Company's Responsible Mining Management System; the Company's ability to comply with contractual and permitting or other regulatory requirements; anticipated exploration and development activities at the Company's projects; and the Company's integration of acquisitions (such as the Chapada mine) and any anticipated benefits thereof. Words such as "believe", "expect", "anticipate", "contemplate", "target", "plan", "goal", "aim", "intend", "continue", "budget", "estimate", "may", "will", "can", "could", "should", "schedule" and similar expressions identify forward-looking statements.

Forward-looking information is necessarily based upon various estimates and assumptions including, without limitation, the expectations and beliefs of management, including that the Company can access financing, appropriate equipment and sufficient labour: assumed and future price of copper, nickel, zinc, gold and other metals; anticipated costs; ability to achieve goals; the prompt and effective integration of acquisitions; that the political environment in which the Company operates will continue to support the development and operation of mining projects; and assumptions related to the factors set forth below. While these factors and assumptions are considered reasonable by Lundin Mining as at the date of this document in light of management's experience and perception of current conditions and expected developments, these statements are inherently subject to significant business, economic and competitive uncertainties and contingencies. Known and unknown factors could cause actual results to differ materially from those projected in the forward-looking statements and undue reliance should not be placed on such statements and information. Such factors include, but are not limited to: risks inherent in and/or associated with operating in foreign countries: uncertain political and economic environments: community activism, shareholder activism and risks related to negative publicity with respect to the Company or the mining industry in general: changes in laws, regulations or policies including but not limited to those related to permitting and approvals, environmental and tailings management, labour, trade relations, and transportation; delays or the inability to obtain necessary governmental approvals and/or permits; regulatory investigations, enforcement, sanctions and/or related or other litigation; risks associated with business arrangements and partners over which the Company does not have full control; risks associated with acquisitions and related integration efforts (including with respect to the Chapada mine), including the ability to achieve anticipated benefits, unanticipated difficulties or expenditures relating to integration and diversion of management time on integration; competition; development or mining results not being consistent with the Company's expectations; estimates of future production and operations; operating, cash and all-in sustaining cost estimates; allocation of resources and capital; litigation; uninsurable risks; volatility and fluctuations in metal and commodity prices; the estimation of asset carrying values; funding requirements and availability of financing; indebtedness; foreign currency fluctuations; interest rate volatility; changes in the Company's share price, and equity markets, in general; changing taxation regimes; counterparty and credit risks; health and safety risks; risks related to the environmental impact of the Company's operations and products and management thereof; unavailable or inaccessible infrastructure and risks related to ageing infrastructure; risks inherent in mining including but not limited to risks to the environment, industrial accidents, catastrophic equipment failures, unusual or unexpected geological formations or unstable ground conditions; actual ore mined varying from estimates of grade, tonnage, dilution and metallurgical and other characteristics; ore processing efficiency; risks relating to attracting and retaining of highly skilled employees; ability to retain key personnel; the potential for and effects of labour disputes or other unanticipated difficulties with or shortages of labour or interruptions in production: the price and availability of energy and key operating supplies or services; the inherent uncertainty of exploration and development, and the potential for unexpected costs and expenses including, without limitation, for mine closure and reclamation at current and historical operations: risks associated with the estimation of Mineral Resources and Mineral Resources and the geology, grade and continuity of mineral deposits including but not limited to models relating thereto; actual ore mined and/or metal recoveries varying from Mineral Resource and Mineral Reserve estimates; mine plans, and life of mine estimates; the possibility that future exploration, development or mining results will not be consistent with expectations; natural phenomena such as earthquakes, flooding, and unusually severe weather; potential for the allegation of fraud and corruption involving the Company, its customers, suppliers or employees, or the allegation of improper or discriminatory employment practices, or human rights violations; security at the Company's operations; breach or compromise of key information technology systems; materially increased or unanticipated reclamation obligations: risks related to mine closure activities; risks related to closed and historical sites; title risk and the potential of undetected encumbrances; risks associated with the structural stability of waste rock dumps or tailings storage facilities; and other risks and uncertainties, including but not limited to those described in the "Risk and Uncertainties" section of the Annual Information Form for the vear ended December 31, 2018 and the "Managing Risks" section of the Company's MD&A for the year ended December 31, 2018, which are available on SEDAR at www.sedar.com under the Company's profile. All of the forward-looking statements made in this document are gualified by these cautionary statements. Although the Company has attempted to identify important factors that could cause actual results to differ materially from those contained in forward-looking information, there may be other factors that cause results not to be as anticipated, estimated, forecast or intended and readers are cautioned that the foregoing list is not exhaustive of all factors and assumptions which may have been used. Should one or more of these risks and uncertainties materialize, or should underlying assumptions prove incorrect, actual results may vary materially from those described in forward-looking information. Accordingly, there can be no assurance that forward-looking information will prove to be accurate and forward-looking information is not a guarantee of future performance. Readers are advised not to place undue reliance on forward-looking information. The forward-looking information contained herein speaks only as of the date of this document. The Company disclaims any intention or obligation to update or revise forward-looking information or to explain any material difference between such and subsequent actual events, except as required by applicable law.

This presentation may contains certain financial measures such as net cash, net debt, operating cash flow per share, co-product cash costs and cash costs which have no standardized meaning within generally accepted accounting principles under IFRS and therefore amounts presented may not be comparable to similar data presented by other mining companies. This data is intended to provide additional information and should not be considered in isolation or as a substitute for measures or performance prepared in accordance with IFRS. Note: All dollar amounts are in US dollars unless otherwise denoted.

Site Visit Agenda

Welcome / Safety Introduction	8:30 am	-	9:30 am
Presentation and Q&A	9:30 am	-	10:30 am
Mine Tour	10:30 am	-	12:00 pm
Plant Tour	12:00 pm	-	1:00 pm
Lunch	1:00 pm	-	2:15 pm
Control Room	2:15 pm	-	2:45 pm
Tailings Storage Facility Tour	2:45 pm	-	4:00 pm
Core Shack	4:00 pm	-	5:00 pm
Close out meeting	5:00 pm	-	5:30 pm
Depart	5:30 pm		



Daniel Daher welcoming Chapada employees and contractors to Lundin Mining



General Overview

- · located in northern Goiás State
- 270 km northwest of national capital of Brasilia and 320 km north of state capital of Goiânia
- supported by road access with good connections to the local and national road network
- average elevation of approximately 300 masl
- low rolling hills with large contiguous flat areas
- tropical climate with two well defined seasons:
 - rainy season from November to March
 - dry season from April to October
- Alto Horizonte, the closest town, has a population of roughly 5,800 people
- local economic activity is mainly agropastoral. Some small scale gold and clay mining activities in area
- ± 750 employees and 1,300 contractors
- 10% of the workforce is female
- majority of the workforce is between 26 to 35 years old (42%) and 36 to 45 years old (32%)

Source: Google Earth

٠

Brief History

lundin mining



Chapada crusher ore stockpile

Safety Performance





Safety Strategy

lundin mining

Safety Culture - Journey



Diagram based on Bradley Curve Safety Dupont Resources

Category	ltem	Brief Description	Status
	Safety Behavior	Implement world class safety behavior program - SAFESTART® to all employees, including main contractors	
Safety	Global Mining Industry Risk Management	World class risk management program to enhance the overall Safety, Health and Environment culture with trainings Y1 / Y2	
Culture	MMIC's Management System	General Management reinforce on MMMI's Governance System with action of Subcommittees of Investigation of Accident, Risk Management, Crisis Management, Contractor Management, Dust, Change Management, Acid Drainage, Ergonomics and Asset Management	
	Leadership	Reinforce field leadership using the concept of Visible Felt Leadership and Operating Discipline	
	Change Management	Reinforce the Corporate Standard using the online tool (Portal MMIC)	
Resources	Risk Management	Training and Implementation of ISO 45001 with Gap Analysis to carry out update from OHSAS 18001 to ISO 45001	
Sustems/	Assessment Qualification for Suppliers and Contractors	Implement the standard by Subcommittee of Contractors Management and using an online tool WebMine	
Processes	Identification of Hazards and Assessment of Safety and Health Risks	Complete review of Workplace Risk Assessment and Control in WebMine to help control the risk index of the areas	
	Overall qualification of the manpower	Qualification program to improve the overall technical knowledge of the main maintenance functions (Welder, Mechanics, Electrician, Scaffolding Assembly people) - Own and Contractors	
Sustainability	Communication	Improve the communication regarding safety goals, accidents, investigations, action plans;	
	Rewards Program	Safety rewards program " <i>Programa de Reconhecimento</i> " e "Família em Ação"	

Risk Management

lundin mining



In-pit crushing



Electrical substations with automatic fire detection and suppression systems



Fire pumping system





Pebbles Circuit



SAG / Ball mill lubication system

Mine Overview

Conventional Open Pit Truck and Excavator Operation

- benefits from a low strip ratio (1.1 LOM) and an in-pit crusher
- production currently from the Cava Central (central), Cava Norte (north), and Corpo Sul (south) pits
- eventually join into a single pit 8 km along strike, up to 1.5 km wide and 380 m deep
- both owner mining and contractor mining
- contractor fleet complements mine operations for mine development
- since November 1st Chapada has been working on a two 12 hour shift with four crews. Contractors remain working on three 8 hour shifts per day



Aerial photograph of Chapada mine

Mine Fleet

- owner fleet of rigid frame haul trucks combined with capacity of 30 Mtpa primarily moving ore
- a variety of diesel hydraulic excavators and front end loaders
- contractor operated fleet with capacity of 48 Mtpa primarily moving hard rock waste
- contractor operated fleet with capacity of 10 Mtpa primarily moving overburden and undertaking ancillary works with smaller equipment



Owner operated mine fleet

Processing Facilities Overview

lundin mining



Conventional Crush, Grind, Float

- single-line plant to treat sulphide ores
- current capacity of 65,000 tpd or 24.0 Mtpa
- produces a high-quality gold-rich copper concentrate
- in 2018 the mill:
 - processed 22.9 Mt of ore
 - average copper recovery of 82.4%
 - average gold recovery of 63.3%
 - average concentrate grade of 24.1% copper and 15.5 g/t gold

Aerial photograph of Chapada mine processing facilities

Electrical System



Connected to National Grid

- majority hydro generated power
- via private 230 kV line
- line is 84km long from Itapaci Maracá
- main power substation 230 / 13.8 kV with three power transformers 42 MVA at mine
- 2018 power cost <US\$0.06 kW/h
- current mine peak power demand is 46 MW
- capacity 100 MW
- sufficient capacity exists for expansion scenarios to 32 Mtpa

Source: Google Earth

Water Balance

- approximately 1,500 mm of rainfall per year
- annual consumption is 3.4M m³/year and with contemplated expansions could increase to 7.0M m³/year, which is within the permitted level
- recycled water constitutes roughly 86% of process requirements
- the open pits are the primary source of make-up water. Storage capacity in the bottom of the mine pits is used to maintain the overall site water balance
- process water is pumped from the water reservoir in the Tailings Storage Facility (TSF) area to the reservoir at the plant
- permitted to withdrawal up to 10.3M m³/yr from local Bois river though not typically required and have not done so in last two years



Water intake system Bois river

Simplified Flow Sheet



Crushing & Ore Stockpile

lundin mining

Primary Crushing

- ore delivered by haul truck to one of two parallel crushing lines
- first line:
 - primary gyratory crusher located adjacent to the Central pit
 - crushed ore conveyed to the MMD sizer for secondary crushing
 - undersize, along with the sizer product, is conveyed to the crushed ore stockpile
- second line:
 - jaw crusher
 - crusher product and grizzly undersized material are combined and transferred to the crushed ore stockpile

Crushed Ore Stockpile

• ore drawn by three apron feeders onto the SAG mill feed conveyor



Crushed ore stockpile







In-pit gyratory crusher

MMD crusher

Jaw crusher

Grinding

- grinding circuit consists of a primary 34 x 19 ft SAG mill. Power was increased as part of 2016/17 plant optimization initiative to increase throughput
- two pebble crushers for SAG mill oversize
- cyclopac consisting of six hydrocyclones
- primary cyclone underflow can be routed to either the ball mill or SAG mill, allowing the SAG mill to be operated in either open or closed circuit
- cyclone underflow is further ground in 24 x 40 ft ball mill



34 x 19 ft SAG mill

pebble crushers

24 ft x 40 ft ball mill

Rougher–Scavenger Flotation & DFR

- rougher flotation circuit consists of two lines of rougher-scavenger flotation cells
- · each line has a bank of five flotation cells retrofitted with Outotec mechanisms
- retrofit of flotation cells completed as part of 2016/17 plant optimization initiative to increase copper and gold recoveries
- in H1/19, six Direct Flotation Reactors (DFR) as rescavengers were installed



Rougher-scavenger and DFR circuit

Regrinding & Scalper Cleaner SFR

- concentrate regrind circuit consists of a Metso Vertimill in closed circuit with a bank of four hydrocyclones
- installed two Stage Flotation Reactor (SFR Woodgrove) on scalper circuit as part of 2017 plant optimization initiative to increase copper and gold recoveries
- concentrate from the SFR scalper cells is final concentrate grade, while tails are pumped to a bank of six conventional cleaner flotation cells



Regrind circuit – Metso Vertimill

SFR cleaner's scalper

Cleaner and Column Flotation & Thickener

- cleaner tailings are pumped to a new bank of four SFR cleaner scavenger flotation cells
- a bank of two Wemco tank cells operate as scavenger cleaner cells in parallel with the new SFR cleaner scavengers. Concentrate from these cells is pumped to the cleaner flotation cell
- concentrate is pumped to a final cleaner column flotation cell
- final concentrate from column and SFR scalper are sent to thickener, after this to concentrate tank and finally to filtration



6 cell cleaner circuit







Concentrate tank and thickener

Scavenger-cleaner circuit

Column flotation circuit

Concentrate Filtration & Storage

- thickened concentrate is filter pressed to approximately 8% moisture
- trucks are weighed before loading and samples are taken from each loader bucket during loading
- loaded trucks are weighed, tarped, and sealed
- concentrate is transported 1,630 km to the Port of Vitoria in the State of Espirito Santo for ocean shipping to Europe and the Far East
- · average travel time to port is four days



Concentrate storage shed; 6,000 t capacity



Multilift facility in Port of Vitoria; source: Multilift



Concentrate truck for haulage to port

Tailings Storage Facility (TSF)

- TSF is located northwest of Chapada open pit
- all dams raised by centerline methods
- Main Dam and Dyke III comprise compacted earth fill starter dams raised with cyclone tailings
- Dyke II is a compacted earth fill dam for water retention
- Main Dam is currently at an elevation of 376 masl
- current permitted capacity for approximately 2.5 years at the current production rate of 24.0 Mtpa
- design underway to raise and permit to 382 masl
- conceptual designs to raise to 398 masl to provide additional storage capacity
- · video monitoring and alarm system in place



lundin mining

21

Mineral Resources, effective June 30, 2019

Deposit	Category	Tonnes (000 t)	Au (g/t)	Contained Cu (000 t)	Contained Au (Moz)	
Copper/Gold						-
Chapada	Measured	328,948	0.25	0.16	807	1.65
	Measured – Stockpile	107,488	0.22	0.16	234	0.54
	Indicated	654,393	0.24	0.15	1549	3.06
Sub-Total	Measured + Indicated	1,090,829	0.24	0.15	2,590	5.24
	Inferred	162,769	0.22	0.08	360	0.41
Gold Only						
Suruca	Measured	12,737		0.42		0.17
	Indicated	134,780		0.54		2.32
Sub-Total	Measured + Indicated	147,518		0.53		2.49
	Inferred	12,565		0.48		0.19

- 2.6Mt of contained copper and 5.2 Moz of contained gold in Measured and Indicated Mineral Resources, inclusive of Mineral Reserves
- drill hole database is comprised of a total of 2,530 drill holes with 377,781 m of drilling at an average length of hole of 149.0 m



Notes:

- 1. All figures are rounded to reflect the relative accuracy of the estimates
- 2. Chapada and Suruca SW copper/gold Mineral Resources are estimated at an NSR cut-off value of US\$4.08/t. Suruca gold only Mineral Resources are estimated at a cut-off grade of 0.16 g/t Au for oxide material and 0.23 g/t Au for sulphide material. Mineral Resources are estimated using price of US\$1,600/oz and copper price of US\$4.00/lb
- 3. Mineral Resources at Chapada are constrained by an optimized pit and the June 2019 topographic surface
- 4. Mineral Resources are inclusive of Mineral Reserves
- 5. Chapada copper/gold Mineral Resources include resource estimates for Cava Central/SW, Corpo Sul, Sucupira, Baru, Santa Cruz and Suruca SW
- 6. Chapada gold only Mineral Resources include resource estimates for Suruca Oxide and Suruca Sulphide
- 7. Felipe Machado de Araujo, Mineral Resources Coordinator, Registered Member of Chilean Mining Commission employed by Chapada prepared the Chapada and Suruca Mineral Resource estimates

Mineral Reserves Support Long Life & Optimization

lundin mining

Mineral Reserves, effective June 30, 2019

Deposit	Category	Tonnes (000 t)	Cu (%)	Au (g/t)	Contained Cu (000 t)	Contained Au (Moz)
Copper/Gold						
Chapada	Proven	292,446	0.24	0.16	706	1.46
	Proven – Stockpile	107,448	0.22	0.16	234	0.50
	Probable	338,855	0.24	0.14	817	1.52
Sub-Total	Proven & Probable	738,789	0.24	0.15	1,757	3.52
Gold Only						
Suruca	Proven	11,454		0.42		0.15
	Probable	53,741		0.53		0.92
Sub-Total	Proven & Probable	65,195		0.51		1.07

- 1.76Mt of contained copper and 4.5 Moz of contained gold in Mineral Reserves
- support operational life of Chapada to 2050 at 24.0 Mpta throughput
- increased Mineral Reserves in the Sucupira and Baru NE deposits further our belief that the area has significant exploration potential which will support mine expansion studies



Notes:

- 1. CIM (2014) definitions were followed for Mineral Reserves
- 2. Chapada copper/gold Mineral Reserves are estimated at an NSR cut-off value of \$4.08/t using an average long-term gold price of US\$1,250/oz and a long-term copper price of \$3.00/lb
- 3. Suruca gold only Mineral Reserves are estimated at a cut-off grade of 0.19 g/t Au for oxide material and 0.30 g/t Au for sulphide material
- 4. Numbers may not add due to rounding
- 5. Luiz Pignatari, Registered Member of Chilean Mining Commission, EDEM Engenharia reviewed and verified the Mineral Reserve estimates

Chapada Production Profile¹

Metal Production kt of copper / koz of gold Copper Gold

1. Production shown is based on the NI 43-101 Technical Report dated October 10, 2019, available on the Company's website and SEDAR under the Company's profile page. See also slide 42.

Operating Costs

continuous production since 2007 and operating costs are tracked and well understood

- over 80% of the operating costs are locally denominated in R\$
- estimated using 3.75 R\$/US\$
- average costs on a cash basis are \$9.12/t milled for the next five years, inclusive of ore stockpile movements and exclusive of mine development costs to be capitalized
- average over the full LOM is expected to trend lower particularly when treating stockpiled ores
- forecast average C1 cash cost over the next five years is \$1.38/lb Cu, net of the precious metal by-product credits, assuming \$1,300/oz gold and \$16.00/oz silver
- effects of copper stream agreements are a component of the copper revenue and will impact realized revenue per pound

Operating Cost	Unit	2020	2021	2022	2023	2024	Average 2020-24
Mining	\$/t material moved	2.04	2.01	2.06	2.04	2.18	2.06
Mining	\$/t milled (excludes capitalized stripping)	5.38	4.73	4.81	5.01	4.04	4.79
Processing	\$/t milled	3.28	3.32	3.33	3.30	3.30	3.31
G&A	\$/t milled	1.18	1.05	1.00	0.94	0.94	1.02
Total	\$/t milled	9.84	9.10	9.14	9.25	8.28	9.12
C1 Cash Cost	\$/Ib copper	1.21	1.34	1.17	1.69	1.49	1.38



U&M contactor operation

Capital Costs

- over 80% of the capital costs are locally denominated in R\$
- estimated using 2019 US\$ and a 3.75 R\$/US\$ exchange rate
- capital costs include primarily:
 - mobile crusher
 - mobile equipment rebuilds and replacements
 - routine TSF dam raises, and
 - distribution pipeline raises and relocations
- infrastructure and plant relocations necessary for the mining of the Sucupira deposit are currently scheduled to commence in 2021 and total \$162M when completed in 2027
- waste stripping costs are capitalized when strip ratios are above the average planned strip ratio for each phase under development
- sustaining capital is forecast to average \$13M annual for the next 31 years of the LOM
- reclamation and closure costs are estimated to be \$127M

Canital Cost (US\$M)	2020	2021	2022	2023	2024	Total 2020-24
Sustaining	2020	2021				
Mine	8.7	18.5	12.5	19.7	7.5	66.9
Mill	13.5	0.8	0.8	2.7	1.1	18.9
Tailings	5.4	4.4	4.4	4.0	4.2	22.7
G&A	1.4	3.8	1.5	3.4	0.9	11.0
Sub-total sustaining	29.0	27.5	18.8	30.0	14.2	119.5
Relocation of infrastructure	-	2.0	35.9	69.9	15.0	122.7
Capitalized stripping	16.9	31.1	32.7	25.6	64.9	171.2
Total	45.9	60.6	87.4	125.5	94.1	413.4



Existing crushed ore stockpile and crushing infrastructure in center and background

Expansion and Optimization

lundin mining

previous Feasibility-level study and basic engineering work ٠ undertaken to support expansion from 24.0 Mtpa to 32.0 Mtpa, potentially in stages significant opportunities to create additional value at Chapada with ٠ processing plant throughput expansions prioritizing near-mine exploration programs to understanding the • potential for Mineral Resource and Reserve increases in parallel, continuing to review and evaluate options for expansions ٠



Sucupira Infrastructure Relocation

New Truck Shop

Process • Water New Main **Tailing Pumping** Substation Storage System • Dam Dike • New work Process Stockpile Plant • **Primary Crushing** Secondary Crushing Structures to be Relocated (Red) **Final Pit**

Process facilities in relation to Sucupira pit and proposed new locations

 current mine plan includes the development and mining of the Sucupira orebody

- infrastructure relocations necessary regardless of ultimate mill throughput rate
- location and capital estimates based on previous basic engineering undertaken as part of expansionary study work
- further exploration, optimization and expansionary study likely to drive refinement, timing and potentially scope change of relocations necessary
- relocation work currently scheduled to commence in late 2021 and mining Sucupira in 2029

Suruca Project Overview



Suruca Project - satellite photograph source: Google Earth

- Mineral Reserve of 65.2Mt grading 0.51 g/t gold estimated to contain 1.07 Moz
- Feasibility Study considers oxide material through a heap leach process
- sulphide material to be fed into a modified Chapada processing plant at the end of the mine life
- exploration activities continue to improve knowledge on the deposit and processing options studied

Focused Exploration Strategy

- anticipate a significant increase in exploration expenditures, largely focused on near mine targets
- a Mineral Inventory Range Analysis (MIRA) study was completed in Q4/19
- MIRA study facilitates and ranks near mine targets to be drill tested to identify areas of high grade for near term expansion of operations
- MIRA process has proven to be very successful at our other operations, particularly at Candelaria, where the Mineral Resource at acquisition was doubled in size due to a sustained exploration effort
- expected expenditures in 2020 of \$10M. To be confirmed in November Guidance and Outlook update
- 2020 program to focus on exploration drilling, geophysics, and a regional structural geology study
- 50,000m of drilling being planned



Chapada deposits and near-mine exploration targets

Responsible Mining

lundin mining

Environmental Management

• taking care of nature is essential to preserve our future. Chapada monitors its impacts and has initiatives to reduce its footprint



ISO 14001:2015 Certification Best international practices and environmental controls



Comprehensive Water Monitoring & Geochemical Stability (Surface, Groundwater and Drainage)



Robust environmental monitoring network



Mine Closure Costs & Asset Retiremen Obligations - ARO



Environmental Education Center

Responsible Mining

lundin mining

Environmental Education Center

- designed to promote the development of activities related to environmental education, as part of the company's commitment to sustainability
- since 2012 several activities were held with young students and citizens from the three surrounding cities, such as World Environment Day, Water Day, Cerrado day, amongst others
 - educational center with office, meeting rooms and auditorium
 - ✓ student house
 - ✓ 100,000 seedlings nursery
 - ✓ 1,561 hectares of Cerrado biome



Responsible Mining

Social Investments

Chapada supports a range of social investment initiatives in order to promote opportunities of long-lasting benefit sharing





Contribution to the Local Economy

· ensuring that local communities benefit from resource development in a meaningful way



CFEM – Mining Royalty - 2018 USD 8.3M (60% transferred to Alto Horizonte)



ISS 2018 – Tax on Services – Alto Horizonte USD 4.3M



Transfers from the Value Added Tax (state level) to Alto Horizonte due to mining activity - 2018 – USD 7.4M



± 750 employees | ±1,300 contractors Near to 49% living at Alto Horizonte and Nova Iguaçu



Local Procurement - 2018 - Alto Horizonte - USD 3.8M

Social License to Operate

• The Commonwealth Scientific and Industrial Research Organization - CSIRO is an independent Australian federal government agency responsible for scientific research



This is a sound level of acceptance. It indicates that while Social License to Operate Index is good, there is still room to improve

Visitor Instructions

- you must wear your Personal Protective Equipment in all areas
 - hardhat with chin strap
 - safety glasses
 - ear protection
 - safety Boots
 - high visibility vest
- · observe the safety signs in the areas you are visiting
- please keep your ID badge visible at all times
- remain by your guide during your visit
- be careful while going up and down the stairs. Use handrails
- maintain a safe distance from operating equipment
- in the event of an emergency, remain calm and follow your guide's instructions
- if medical assistance is needed during your visit, there is a medical post with health professionals and an ambulance available



Geology students visiting Chapada mine

Appendix

Geological Overview

lundin mining



670000

Historical Plant Throughput & Feed Grades¹



1. as disclosed in the NI 43-101 Technical Report dated October 10, 2019, available on the Company's website and SEDAR under the Company's profile page. See also slide 42.

24.0 Mtpa Processing Plan¹

lundin mining



1. based on the NI 43-101 Technical Report dated October 10, 2019, available on the Company's website and SEDAR under the Company's profile page. See also slide 42.

Life of Mine Plan¹ – 24 Mtpa

lundin mining

Mine Production Plan	Units	2H2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044	2045	2046	2047	2048	2049	2050	Total
Chapada Main Open Pit																																		
Ore fed to mill	Tonnes (Mt)	3.86	9.59	14.08	10.19	8.99	6.66	17.68	3.78	13.45	0.35	22.87	21.79	6.58	0.74	1.64			-			1.75	8.14	3.84	7.86	-				-			-	163.82
-	Cu (%)	0.31	0.27	0.28	0.30	0.28	0.30	0.27	0.24	0.28	0.22	0.21	0.23	0.24	0.22	0.21	-	-	-	-	-	0.21	0.21	0.21	0.28	-	-	-	-	-	-	-	-	0.26
	Au (o/t)	0.20	0 17	0.16	0.18	0.20	0.21	0.20	0.19	0.18	0.11	0.14	0.12	0.14	0.08	0.15						0.16	0.08	0 10	0.16				-	-			-	0.16
Ore to Stock	Tonnes (Mt)	3.77	4.80	6.04	7.41	0.20		2 20	0.83	1 58	0.38	6.80	2.52		0.17	0.32		3 35	0.00	0.22		0.37	1.84	0.10	0.10									42.84
OTE TO STOCK	Cu (%)	0.19	0.15	0.14	0.22			0.16	0.00	0.12	0.10	0.14	0.14		0.14	0.42		0.12	0.00	0.12		0.17	0.12										-	0.10
	Cu (%)	0.10	0.15	0.14	0.22	-	-	0.10	0.13	0.13	0.10	0.14	0.14	-	0.14	0.12	-	0.12	0.13	0.12	-	0.17	0.13	-	-	-	-	-	-	-	-	-	-	0.10
	Au (g/t)	0.08	0.08	0.08	0.16	-	-	0.10	0.07	0.06	0.09	0.07	0.04	-	0.04	0.08	-	0.03	0.03	0.03	-	0.13	0.04	-	-	-	-	-	-	-	-	-	-	0.08
Corpo Sul		0.00	0.05	0.07	E 10	0.05		0.00	47.00	7.50		0.07				44.00	1.05	40.00	45.04			40.05	0.40		0.00									400 75
Ore fed to mill	Tonnes (Mt)	8.29	8.85	2.97	5.40	6.85	14.42	3.33	17.23	7.56	23.65	0.07	-	-	-	11.09	1.95	19.68	15.04	-	-	13.95	8.40	8.63	6.39	-	-	-	-	-	-	-	-	183.75
	Cu (%)	0.30	0.29	0.28	0.27	0.24	0.24	0.27	0.26	0.23	0.25	0.20	-	-	-	0.22	0.23	0.25	0.27	-	-	0.24	0.22	0.24	0.25	-		-	-	-	-	-	-	0.25
One to Oheelt	Au (g/t)	0.24	0.24	0.20	0.19	0.14	0.14	0.15	0.14	0.18	0.16	0.10	-	-	-	0.11	0.10	0.11	0.12	-	-	0.11	0.09	0.12	0.14	-		-	-	-	-	-	-	0.14
Ore to Stock	Tonnes (kt)	4.89	1.11	5.89	8.90	3.78	0.08	0.38	1.11	1.//	4.49	0.03	-	-	-	2.28	0.66	2.45	1.64	-	-	3.21	2.30	0.78	-			-	-	-	-	-	-	59.00
	Cu (76)	0.24	0.14	0.12	0.17	0.14	0.17	0.14	0.14	0.13	0.13	0.13	-	-	-	0.13	0.15	0.15	0.15	-	-	0.13	0.13	0.13	-	-	-	-	-	-	-	-	-	0.15
Sucurita	Au (g/t)	0.10	0.07	0.06	0.10	0.07	0.09	0.07	0.07	0.07	0.06	0.06	-	-	-	0.05	0.05	0.05	0.05	-	-	0.05	0.04	0.05	-			-	-	-	-	-	-	0.00
Ore fed to mill	Toppos (Mt)											1.06	2.24	16 90	20.26	8 27	10.05	1 32	5.06	21.01	21.00	5 30	4.46	11 52	0.30									146 70
Ore red to mili	Cu (%)											0.24	0.24	0.03	0.20	0.27	0.24	0.02	0.00	0.24	0.24	0.30	0.25	0.20	0.30									0.20
	Cu (76)	-	-	-	-	-	-	-	-	-	-	0.24	0.24	0.27	0.29	0.35	0.31	0.23	0.24	0.31	0.31	0.30	0.25	0.20	0.20	-	-	-	-	-	-	-	-	0.29
Ore to Stock	Toppos (Mt)	-	-	-		-	-	-		-	-	0.20	0.27	4.10	4.22	1.06	4 00	0.20	2.69	2.22	2.67	1.20	0.10	1.41	0.10	-		-	-	-	-	-	-	20.40
OTE ID SLOCK	Cu (%)									-		0.13	0.30	9.12	9.33	0.13	9.80	0.40	0.13	0.13	0.13	0.12	0.13	0.13									-	0.13
	Au (olt)					-	-	-		-		0.04	0.04	0.05	0.04	0.13	0.05	0.04	0.04	0.04	0.05	0.06	0.04	0.04										0.15
Baru NE	Au (grt)	-				-				-		0.04	0.04	0.00	0.04	0.04	0.00	0.04	0.04	0.04	0.00	0.00	0.04	0.04										0.00
Ore fed to mill	Toppes (Mt)					5.26				-				-			-							-	-									5 26
	Cu (%)					0.33	-	-			-				-		-	-	-	-	-		-					-	-		-	-		0.33
	Au (o/t)					0.12	-				-			-		-		-	-		-		-	-				-	-	-	-		-	0.12
Ore to Stock	Tonnes (Mt)					1 47				_			-		-					_		_	-	-		-			-	-				1.47
one to otdok	Cu (%)					0.13				-			-			-	-			-		-		-	-	-			-	-				0.13
	Au (a/t)					0.05	-	-	-	-	-	-	-	-	-	-	-	-		-	-	-		-	-	-		-	-	-	-	-	-	0.05
	100 (8.1)					0.00																												0.00
Ore from HG Stock to Mill	Tonnes (Mt)	0.10	3.60	3.60	3.60	2.91	2.92	3.00	-	-	-	-	-	-	-			-	-	-		-		-	-		20.80	24.00	24.00	24.00	24.00	24.00	7.04	167.57
	Cu (%)	0.36	0.29	0.28	0.27	0.18	0.18	0.18		-	-			-	-			-	-	-	-			-			0.18	0.18	0.16	0.12	0.12	0.12	0.12	0.16
	Au (q/t)	0.25	0.24	0.20	0.19	0.12	0.12	0.11	-	-	-	-	-	-	-	-	-	-	-	-	-	-		-	-		0.11	0.11	0.09	0.05	0.05	0.05	0.05	0.08
Ore from LG Stock to Mill	Tonnes (Mt)	-	1.46	3.35	4.81	-	-	-	3.00	3.00	-	-	-	0.53	2.99	3.00	3.00	3.00	3.00	2.99	3.00	3.00	3.00	-	1.36	24.00	3.20	-	-	-	-	-	-	71.68
	Cu (%)	-	0.23	0.23	0.23	-	-	-	0.24	0.24	-	-	-	0.24	0.24	0.24	0.24	0.24	0.24	0.24	0.24	0.24	0.24	-	0.24	0.24	0.24	-	-	-	-	-	-	0.23
	Au (g/t)	-	0.17	0.17	0.17	-	-	-	0.17	0.17	-	-	-	0.17	0.17	0.17	0.17	0.17	0.17	0.17	0.17	0.17	0.17	-	0.17	0.17	0.17	-	-	-	-	-	-	0.17
Total Ore to Plant	Tonnes (Mt)	12.25	23.50	24.00	24.00	24.00	24.00	24.00	24.00	24.00	24.00	24.00	24.00	24.00	24.00	24.00	24.00	24.00	24.00	24.00	24.00	24.00	24.00	24.00	24.00	24.00	24.00	24.00	24.00	24.00	24.00	24.00	7.04	738.79
	Cu (%)	0.30	0.28	0.27	0.27	0.27	0.25	0.26	0.25	0.26	0.25	0.21	0.23	0.26	0.28	0.27	0.29	0.24	0.26	0.30	0.30	0.25	0.23	0.25	0.27	0.24	0.19	0.18	0.16	0.12	0.12	0.12	0.12	0.24
	Au (gpt)	0.23	0.20	0.17	0.18	0.15	0.16	0.18	0.15	0.18	0.16	0.14	0.13	0.15	0.20	0.16	0.21	0.13	0.13	0.21	0.23	0.15	0.11	0.15	0.16	0.17	0.12	0.11	0.09	0.05	0.05	0.05	0.05	0.15
Main Open Pit Waste Mined	Tonnes (Mt)	4.48	16.09	13.36	5.00	0.36	0.87	41.93	32.47	27.62	1.94	16.76	7.51	1.53	0.15	4.89	0.00	9.47	0.70	-	-	-	-	-	-	-	-	-	-	-	-	-		185.11
Strip Ratio Main Open Pit		0.59	1.11	0.66	0.28	0.04	0.13	2.10	7.06	1.84	2.67	0.57	0.31	0.23	0.16	2.50	0.00	2.83	7.68	-	-	-	-	-	-	-	-	-	-	-	-	-	-	0.90
Corpo Sul Waste Mined	Tonnes (Mt)	11.77	17.84	20.77	24.16	19.15	40.72	1.40	9.44	13.94	39.18	0.16	-	-	-	2.59	1.07	2.81	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	205.00
Strip Ratio Corpo Sul		0.89	1.12	2.34	1.69	1.80	1.93	0.38	0.50	1.49	1.39	1.67	-	-	-	0.19	0.41	0.13	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	0.84
Sucupira Waste Mined	Tonnes (Mt)	-	-	-	-	-	-	-	1.48	1.09	-	22.12	33.51	38.88	41.35	34.87	39.30	24.68	35.85	41.06	42.33	38.95	6.62	-	-	-	-	-	-	-	-	-	-	402.08
Strip Ratio Sucupira		-	-	-	-	-	-	-	-	-	-	19.95	13.03	1.85	1.68	3.74	1.64	14.29	4.15	1.69	1.72	5.91	1.26	-	-	-	-	-	-	-	-	-	-	2.30
Baru Waste Mined	Tonnes (Mt)	-	-	-	-	22.26	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	22.26
Strip Ratio Baru		-	-	-	-	3.31	-	-		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.31
Plant Production Plan	Units	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044	2045	2046	2047	2048	2049	2050	Total
Plant Recoveries	Cu Rec%	82.7%	85.1%	83.4%	82.2%	85.7%	84.8%	85.0%	82.8%	83.4%	84.6%	82.8%	83.8%	84.7%	84.6%	84.0%	85.0%	82.4%	83.1%	85.3%	85.6%	82.7%	81.3%	84.9%	85.0%	67.5%	77.9%	80.1%	79.1%	76.3%	76.3%	76.3%	76.3%	-
	Au Rec%	63.0%	61.0%	57.4%	57.4%	58.4%	58.6%	60.5%	56.3%	58.2%	58.2%	57.4%	56.9%	57.1%	60.1%	58.0%	60.8%	54.0%	54.2%	60.4%	62.2%	57.2%	52.4%	58.5%	57.6%	46.9%	51.9%	53.2%	51.1%	45.1%	45.1%	45.1%	45.1%	-
Concentrate Production	Tonnes (000 t)	130.46	238.88	233.48	229.42	236.25	217.82	221.42	211.22	222.35	214.78	180.68	199.49	222.19	244.88	229.45	254.06	205.73	217.12	260.47	266.16	208.69	187.22	218.74	237.51	162.00	147.75	145.56	131.86	94.11	94.11	94.11	27.61	6,185.55
1	Cu (%)	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50	23.50
	Au (g/t)	13.45	5 12.30	10.26	11.08	9.18	10.18	12.07	9.86	11.12	10.16	11.05	9.12	9.10	11.76	9.98	11.91	7.99	7.95	11.44	13.03	9.97	7.30	9.74	9.03	12.11	9.86	9.47	8.38	5.46	5.46	5.46	5.46	10.12
Contained Metal	Cu (000 t)	30.66	56.14	54.87	53.91	55.52	51.19	52.03	49.64	52.25	50.47	42.46	46.88	52.21	57.55	53.92	59.70	48.35	51.02	61.21	62.55	49.04	44.00	51.40	55.82	38.07	34.72	34.21	30.99	22.11	22.11	22.11	6.49	1,453.60
	Au (000 oz)	56.42	2 94.50	77.02	81.74	69.70	71.29	85.92	66.99	79.50	70.17	64.17	58.51	65.02	92.62	73.60	97.27	52.86	55.53	95.83	111.53	66.92	43.92	68.49	68.94	63.10	46.81	44.31	35.51	16.52	16.52	16.52	4.85	2,012.61

1. Production shown is based on the NI 43-101 Technical Report dated October 10, 2019, available on the Company's website and SEDAR under the Company's profile page. See also slide 42.

NI 43-101 Compliance

Unless otherwise indicated, Lundin Mining Corporation (the "Company") has prepared the technical information in this presentation including Mineral Reserve and Mineral Resource estimates ("Technical Information") based on information contained in the technical reports and news releases (collectively the "Disclosure Documents") available under the Company's profile on SEDAR at www.sedar.com. Each Disclosure Document was prepared by or under the supervision of a qualified person ("Qualified Person") as defined in National Instrument 43-101 – Standards of Disclosure for Mineral Projects of the Canadian Securities Administrators ("NI 43-101"). For readers to fully understand the information which qualifies the Technical Information. Readers are advised that Mineral Resource estimates that are not Mineral Reserves do not have demonstrated economic viability. The Disclosure Documents are each intended to be read as a whole, and sections should not be read or relied upon out of context. The Technical Information is subject to the assumptions and qualifications contained in the Disclosure Documents.

The Technical Information in this presentation has been prepared in accordance NI 43-101 and has been reviewed and approved by Stephen Gatley, BSc (Eng), C.Eng. Vice President - Technical Services of the Company, a "Qualified Person" under NI 43-101. Mr. Gatley has verified the data disclosed in this presentation and no limitations were imposed on his verification process.

Mineral Resource and Mineral Reserve estimates of the Company are shown on a 100 percent basis for each mine. The Measured and Indicated Mineral Resource estimates are inclusive of those Mineral Resource estimates modified to produce the Mineral Reserve estimates. All estimates of the Company are prepared as at June 30, 2019. Estimates for all operations are prepared by or under the supervision of a Qualified Person as defined in NI 43-101 or have been audited by independent Qualified Persons on behalf of the Company.

Mineral Resources at Candelaria are estimated using metal prices of US\$3.16/lb copper and US\$1,000/oz gold and an exchange rate of USD/CLP 600. Mineral Resources at Chapada and Suruca SW copper-gold are estimated using metal prices of US\$4.00/lb copper and US\$1,600/oz gold and an exchange rate of USD/BRL 3.95. For the Suruca gold only Mineral Resource estimates at Chapada a gold price of \$1,500/oz has been used and an exchange rate of USD/BRL 3.95. For the Suruca gold only Mineral Resource estimates at Chapada a gold price of \$1,500/oz has been used and an exchange rate of USD/BRL 3.95. Mineral Resource for Neves-Corvo and Semblana have been estimated using metal prices of US\$2.75/lb copper and US\$1.00/lb zinc and an exchange rate of EUR/USD 1.25. The Semblana Mineral Resource has been reported using the same metal prices and exchange rates as Neves-Corvo. Mineral Resources at Zinkgruvan have been estimated using metal prices of US\$2.75/lb copper, US\$1.00/lb zinc and an exchange rates of USD/SEK 7.00. Mineral Resources and Mineral Reserves at Eagle and Eagle East have been estimated using metal prices of US\$2.75/lb copper and US\$8.00/lb nickel. Refer to the Company's news release dated September 5, 2019 entitled "Lundin Mining Announces 2019 Mineral Resource and Reserve Estimates" on the Company's website (www.lundinmining.com).

For further Technical Information on the Company's material properties, refer to the following technical reports, each of which is available on the Company's SEDAR profile at www.sedar.com:

Candelaria: technical report entitled Technical Report for the Candelaria Copper Mining Complex, Atacama Region, Region III, Chile dated November 28, 2018. Chapada: technical report entitled Technical Report on the Chapada Mine, Goiás State, Brazil dated October 10, 2019 Neves-Corvo: technical report entitled NI 43-101 Technical Report for the Neves-Corvo Mine, Portugal dated June 23, 2017. Zinkgruvan: technical report entitled NI 43-101 Technical Report for the Zinkgruvan Mine, Central Sweden dated November 30, 2017. Eagle Mine: technical report entitled Technical Report on the Eagle Mine, Michigan, U.S.A. dated April 26, 2017.



www.lundinmining.com | TSX: LUN | Nasdaq Stockholm: LUMI