阳光油砂
SUNSHINE OILSANDS LTD.

MANAGEMENT'S DISCUSSION AND ANALYSIS

For the three and twelve months ended December 31, 2021 and 2022

*This Management's Discussion and Analysis ("MD&A") of the financial condition and performance of Sunshine Oilsands Ltd. ("*Sunshine*" or the "Company") for the three and twelve months ended December 31, 2022 is dated March 24, 2023, and approved by the Company's Board of Directors. This MD&A should be read in conjunction with the Company's audited consolidated financial statements and notes thereto for the year ended December 31, 2022. All amounts and tabular amounts are stated in thousands of Canadian dollars unless indicated otherwise.*

Overview

Sunshine is a holder and a developer of Athabasca region oil sands resources with approximately 0.91 billion barrels of risked best estimate contingent resources. The Company's un-risked best estimate contingent resources at December 31, 2022 was approximately 1.53 billion barrels. With approximately 1 million acres of oil sands and petroleum and natural gas leases, the Company has significant commercial development potential. Phase I (5,000 barrels) of the West Ells 10,000 barrels thermal commercial project is in production. The Athabasca region is the most prolific oil sands region in the Province of Alberta, Canada. Canada's oil sands represent the largest oil resource found in a stable political environment located in the Western Hemisphere and the third largest oil resource in the world. Canadian oil sands represent the largest single source of supply of oil imported into the United States. The Company has one business and geographical segment. Accordingly, no business and geographical segment information is presented.

The Company's focus is on evaluating and developing its oil sands assets with the completion and operation of the 5,000 bbls/day Phase I commercial West Ells (the "Project"). When financing is available, the Company plans to add an additional 5,000 barrels per day of production capacity at Phase II to the Project. On March 1, 2017, the West Ells Phase I commenced commercial production.

As at December 31, 2022, the Company had invested approximately $1.28 billion in oil sands leases, drilling operations, project engineering, procurement and construction, operation start-up, regulatory application processing and other assets. As at December 31, 2022, the Company had $0.54 million in cash.

The Company relies on its ability to obtain various forms of financing and cash flow from operations to fund administration expenses and future exploration and development cost of its projects. The Company's ability to continue as a going concern is dependent on continuing operations and development in West Ells, marketing bitumen blends at favorable prices, achieving profitable operations and the ability to refinance current debt and access immediate additional financing. There can be no assurance that the steps management takes will be successful. As such, there is significant doubt and there can be no assurance that the Company will be able to continue as a going concern.

Operational Update

West Ells

On March 1, 2017, the Company achieved a key milestone. The Project commenced commercial production. Hence, effective March 1, 2017, the Company started recording revenue, royalties, expenses and depletion of the West Ells Project. On March 31, 2020, the Board has decided to temporarily suspend production due to volatility in the international crude oil market, severe decline in crude oil prices, and having considered the fact that the Company's West Ells production equipment and road need repair, coupled with the outbreak of COVID-19 in Canada. On March 8, 2022, the Company announced that it has completed the preliminary preparatory work for resumption of production in the West Ells project. On April 11, 2022, the West Ells project has fully resumed operation.

For the three and twelve months ended December 31, 2022, the Company's average bitumen production was 934 bbls/day and 457 bbls/day respectively. The bitumen is blended with diluent as part of the production process to create the marketable "Dilbit" blend product. The average Dilbit sales volume was 1,007.5 bbls/day and 516.7 bbls/day for the three and twelve months ended December 31, 2022.

Thickwood and Legend

The Thickwood and Legend projects are each planned for initial phase one production of 10,000 barrels per day. Regulatory approval for Thickwood was received in the third quarter of 2013.

Muskwa and Godin Clastics Operations (Non-Operated 50% working interest)

As at the date of this report, Muskwa has no production. Development of Muskwa area is expected to be reactivated in 2023 under new ownership of Renergy, at no cost to Sunshine.

Summary of Quarterly Results

The following table summarizes selected financial information for the Company for the last eight quarters:

($ thousands except per share & bbl/d)	Q4 2022	Q3 2022	Q2 2022	Q1 2022	Q4 2021	Q3 2021	Q2 2021	Q1 2021
Bitumen sales (bbl/d)	816	802	30	-	-	-	-	22
Petroleum sales	7,275	7,765	589	-	-	-	-	144
Royalties	266	676	20	-	-	-	1	-
Diluent	3,596	3,094	294	-	-	-	-	-
Transportation	2,050	1,779	91	6	-	2	-	43
Operating costs	6,506	4,030	5,002	3,404	2,456	1,841	1,602	1,825
Finance cost	(28,063)	13,003	12,166	11,631	9,392	12,300	11,712	13,422
Net loss/(profit)	490,907	(322,871)	(46,099)	(56,232)	707	(27,306)	22,789	2,688
Net loss/(profit) attributable to owners of the company	490,832	(322,945)	(46,173)	(56,311)	632	(27,514)	22,791	2,625
Per share - basic and diluted	2.02	(1.33)	(0.19)	(0.23)	0.00	(0.11)	0.12	0.02
Capital expenditures[1]	514	(185)	1,137	181	1,428	460	486	428
Total assets	747,719	1,240,853	877,108	812,323	755,724	762,847	753,425	756,209
Working capital deficiency[2]	511,583	499,257	57,625	100,543	93,005	97,147	535,469	513,103
Shareholders' equity	110,009	601,569	278,698	232,599	176,367	176,125	148,756	162,509

1. Includes payments for exploration and evaluation, property, plant and equipment.
2. The working capital deficiency includes the foreign exchange loss from conversion of current portion of HKD/CNY denominated loans from related companies and shareholder into CAD at each period end exchange rate and the USD of the Notes converted to CAD at each period end exchange rate.

Results of Operations

Bitumen Realization

	For the three months ended December 31 ,				For the twelve months ended December 31,			
($ thousands, except $/bbl)		2022		2021		2022		2021
Dilbit revenue	$	7,275	$	-	$	15,629	$	144
Diluent blended		(3,596)		-		(6,984)		-
Realized bitumen revenue[1]	$	3,679	$	-	$	8,645	$	144
($ / bbl)		39.69		N/A		45.83		58.75

1. Realized bitumen revenue is used to calculate operating netbacks.

Bitumen realization represents the Company's realized petroleum revenue ("Dilbit revenue"), net of diluent expenses. Dilbit revenue represents the Company's revenue from its bitumen produced at West Ells project blended with purchased diluent. The cost of blending is impacted by the amount of diluent required and the Company's cost of purchasing and transporting the diluent. A portion of the diluent expense is effectively recovered in the sales price of the blended product.

For the three and twelve months ended December 31, 2022, the Company's bitumen realization revenue increased by $3.7 million and $8.5 million to $3.7 million and $8.6 million from $0 million and $0.1 million for the same period in 2021. The increase in bitumen realization revenue was primarily due to higher bitumen production and dilbit sales at West Ells partially offset by higher diluent blending expenses. The bitumen realized price per barrel decreased by $12.92 /bbl to $45.83 /bbl from $58.75/bbl for the twelve months ended December 31, 2022.

Operating Netback

($ thousands, except $/bbl)	For the three months ended December 31, 2022	2021	For the twelve months ended December 31, 2022	2021
Realized bitumen revenue	$ 3,679	$ -	$ 8,645	$ 144
Transportation	(2,050)	-	(3,926)	(45)
Royalties	(266)	-	(962)	(1)
Net bitumen revenues	$ 1,363	$ -	$ 3,757	$ 98
Operating costs	(6,506)	(2,456)	(18,942)	(7,724)
Operating cash flow[1]	$ (5,143)	$ (2,456)	$ (15,185)	$ (7,626)
Operating netback ($ / bbl)	(55.50)	N/A	(80.52)	(3,119.41)

1. Operating cash flow is a non-GAAP measure which is defined in the Advisory section of this MD&A.

The Operating cash flow for the three and twelve months ended December 31, 2022 was a net loss of $5.1 million and $15.2 million compared to a net loss of $2.5 million and $7.6 million for the three and twelve months ended December 31, 2021, respectively. The increase in operating cash flow deficiency for 2022 vs 2021 was primarily due to operating costs incurred during the production resumption and ramp-up in the first 6 months of the year with minimal dilbit sales. There was no disclosure on operating netback per barrel for 4Q21 as there was zero dilbit sales after the temporary suspension of production since 31 March 2020. Operating netback loss per barrel decreased by $3,038.89/bbl to a loss of $80.52/bbl from a loss of $3,119.41/bbl for the year ended December 31, 2022 primarily due to significant increase in dilbit sales volume partially offset by higher transportation, royalties and operating costs.

Bitumen Production

(Barrels/day)	For the three months ended December 31 , 2022	2021	For the twelve months ended December 31, 2022	2021
Bitumen production	934	-	457	-

Bitumen production at West Ells for the three and twelve months ended December 31, 2022 averaged 934 Bbls/day and 457 bbls/day compared to 0 Bbls/day for the three and twelve months ended December 31, 2021. For the three and twelve months ended December 31, 2021, bitumen production averaged 0 bbls/day due to temporary production suspension since March 31, 2020. On April 11, 2022, West Ells project has fully resumed operation.

Bitumen Sales

(Barrels/day)	For the three months ended December 31, 2022	2021	For the twelve months ended December 31, 2022	2021
Bitumen Sales	816	-	415	7

Bitumen sales at West Ells for the three and twelve months ended December 31, 2022 averaged 816 Bbls/day and 415 Bbls/day compared to 0 Bbls/day and 7 Bbls/day for the three and twelve months ended December 31, 2021, respectively. For the twelve months ended December 31, 2022, bitumen sales increased by 408 Bbls/day compared to the same period of 2021 due to resumed bitumen production and sales at West Ells in 2022.

Petroleum Sales, net of royalties

($ thousands, except $/bbl)	For the three months ended December 31 , 2022	2021	For the twelve months ended December 31, 2022	2021
Petroleum sales	$ 7,275	$ -	$ 15,629	$ 144
Royalties	(266)	-	(962)	(1)
Balance, end of period	$ 7,009	$ -	$ 14,667	$ 143
$ / bbl	75.62	N/A	77.76	58.75

Petroleum sales are from the sales of Dilbit. Petroleum sales, net of royalties for the three months ended December 31, 2022 increased by $7.0 million mainly due to increased bitumen production and thus higher sales volume at West Ells in 2022. There was no disclosure on the petroleum sales per barrel for 4Q21 as no sales occurred during the quarter after the temporary suspension of production since 31 March 2020.

For the twelve months ended December 31, 2022 vs 2021, petroleum sales, net of royalties increased by $14.6 million to $14.7 million from $0.1 million, net petroleum sales per barrel increased by $19.01/bbl to $77.76/bbl from $58.75/bbl. The increase in net petroleum sales was primarily due to higher sales volumes and higher WCS price in 2022 partially offset by increased royalties.

The royalty rate applicable to pre-payout oil sands operations starts at 1% of bitumen sales and increases for every dollar that the WTI crude oil price in Canadian dollars is priced above $55 per barrel, to a maximum of 9% when the WTI crude oil price is $120 per barrel or higher. The West Ells project is currently in pre-payout. Royalties for the three and twelve months ended December 31, 2022 increased by $0.3 million and $1.0 million compared to the same period of 2021 due to higher bitumen sales and increased royalty rate resulting from increased oil price.

Diluent Costs

($ thousands, except $/bbl and blend ratio)	For the three months ended December 31, 2022	2021	For the twelve months ended December 31, 2022	2021
Diluent	$ 3,596	$ -	$ 6,984	$ -
$/bbl	38.80	N/A	37.03	N/A
Blend ratio	19.0%	N/A	19.6%	N/A

At West Ells, diluent is blended with the bitumen as part of the production process to create a marketable Dilbit blend product at West Ells. Diluent expense is mainly impacted by the required amount, cost of purchasing and transporting diluent, Canadian and U.S. benchmark pricing, the timing of diluent inventory purchases and changes in value of the Canadian dollar relative to the U.S. dollar.

Diluent costs increased by $3.6 million and $7.0 million for the three and twelve months ended December 31, 2022 respectively compared to the same periods in 2021, primarily due to higher required amount of diluent as a result of production resumption at West Ells. Diluent costs per barrel for the three and twelve months ended December 31, 2022 was $38.80/bbl and $37.03/bbl. There is no disclosure for the diluent cost per barrel and blend ratio for the same period in 2021 as there was zero dilbit sales after the temporary suspension of production since 31 March 2020.

Transportation

($ thousands, except $/bbl)	For the three months ended December 31, 2022	2021	For the twelve months ended December 31, 2022	2021
Transportation	$ 2,050	$ -	$ 3,926	$ 45
$ / bbl	22.12	N/A	20.82	18.37

Transportation costs consist of trucking costs for Dilbit and pipeline terminals fees. The transportation expense per barrel for the three and twelve months ended December 31, 2022 was $22.12/bbl and $20.82/bbl compared to $0/bbl and $18.37/bbl for the same period in 2021. The increase in the transportation cost per barrel was mainly due to increased rate charged by third party trucking companies.

Operating Costs

($ thousands, except $/bbl)	For the three months ended December 31, 2022	2021	For the twelve months ended December 31, 2022	2021
Energy operating costs	$ 3,127	$ 781	$ 7,942	$ 2,551
Non-energy operating costs	3,379	1,675	11,000	5,173
Operating costs	$ 6,506	$ 2,456	$ 18,942	$ 7,724
$ / bbl	70.20	N/A	100.43	3,159.29

Operating costs are comprised of the sum of non-energy operating costs and energy costs. Non-energy operating costs represent production-related operating activities, excluding energy operating costs. Energy operating costs represent the cost of natural gas for the production of steam and power at the West Ells facilities.

For the three and twelve months ended December 31, 2022, the operating costs increased by $4.0 million and $11.2 million to $6.5 million and $18.9 million from $2.5 million and $7.7 million for the same period in 2021. The increase in operating costs from last year was primarily due to increased production and labor costs due to production resumption. In addition, the surge in natural gas price also contributed to the increase in energy costs. Since the majority of the operating costs at West Ells are fixed in nature, the operating costs per barrel of production should be reduced as production continues to increase at West Ells.

General and Administrative Costs

	For the three months ended December 31 ,					
	2022			2021		
($ thousands)	**Total**	**Capitalized**	**Expensed**	**Total**	**Capitalized**	**Expensed**
Salaries, consulting and benefits	$ 1,031	$ -	1,031	$ 897	$ -	897
Rent	(97)	-	(97)	41	-	41
Legal and audit	519	-	519	306	-	306
Other	938	-	938	2,907	-	2,907
Total	$ 2,391	$ -	2,391	$ 4,151	$ -	4,151

	For the twelve months ended December 31,					
	2022			2021		
($ thousands)	**Total**	**Capitalized**	**Expensed**	**Total**	**Capitalized**	**Expensed**
Salaries, consulting and benefits	$ 4,764	$ -	4,764	$ 4,315	$ -	4,315
Rent	225	-	225	234	-	234
Legal and audit	1,192	-	1,192	630	-	630
Other	4,883	-	4,883	3,933	-	3,933
Total	$ 11,064	$ -	11,064	$ 9,112	$ -	9,112

The Company's general and administrative costs were $2.4 million and $11.1 million for the three and twelve months ended December 31, 2022 compared to $4.2 million and $9.1 million for the same period in 2021. For the three months ended December 31, 2022, general and administrative costs decreased by $1.8 million primarily due to change in municipal charges. For the twelve months ended December 31, 2022, the increase of $2.0 million was primarily due to higher audit fee, salary and municipal charge.

Finance Costs

	For the three months ended December 31,		For the twelve months ended December 31,	
($ thousands)	2022	2021	2022	2021
Interest expense on senior notes, including yield maintenance premium ("YMP")	$ (29,800)	$ 10,430	$ 1,710	$ 41,130
Interest expense on other loans	170	(2,288)	651	979
Interest expense on loan from related companies	1,156	958	4,995	3,718
Other interest-lease and others	66	47	143	123
Accretion	345	245	1,238	876
Finance costs	$ (28,063)	$ 9,392	$ 8,737	$ 46,826

The Company's finance costs were $(28.1) million and $8.7 million for the three and twelve months ended December 31, 2022 compared to $9.4 million and $46.8 million for the three and twelve months ended December 31, 2021. For the three months and twelve months ended December 31, 2022, finance costs decreased by $37.5 million and $38.1 million respectively compared to the same period in 2021 primarily attributed to interest waived on senior notes which was recorded as other income in 2021 as opposed to finance cost reduction in 2022.

Share-based Compensation

	For the three months ended December 31 ,					
	2022			2021		
($ thousands)	**Total**	**Capitalized**	**Expensed**	**Total**	**Capitalized**	**Expensed**
Share-based compensation	$ -	-	-	$ 1	-	1

	For the twelve months ended December 31,					
	2022			2021		
($ thousands)	**Total**	**Capitalized**	**Expensed**	**Total**	**Capitalized**	**Expensed**
Share-based compensation	$ -	-	-	$ 5	-	5

Share-based compensation expense for the three and twelve months ended December 31, 2022 was $0 thousand compared to $1 thousand and $5 thousands for the same periods in 2021. The fair value of share-based compensation associated with the granting of stock options is recognized by the Company in its audited consolidated financial statements. Fair value is determined using the Black-Scholes option pricing model.

Depletion, Depreciation and Impairment

	For the three months ended December 31,		For the twelve months ended December 31,	
($ thousands, except $/bbl)	2022	2021	2022	2021
Depletion	$ 1,261	$ -	$ 3,104	$ -
Depreciation	163	379	766	1,283
Depletion and depreciation	$ 1,424	$ 379	$ 3,870	$ 1,283
Depletion ($ / bbl)	13.60	-	16.46	-

The Company commenced commercial production at West Ells Phase I Project on March 1, 2017. As at that time, the Company started recording depletion of West Ells Project I assets in the statement of comprehensive income (loss) for the three months ended March 31, 2017. The depletion rate is based on unit-of-production.

Depletion expense was $1.3 million and $3.1 million for the three and twelve months ended December 31, 2022 compared to $0 million for the three and twelve months ended December 31, 2021, respectively. Depletion expense increased by $1.3 and $3.1 million mainly due to higher bitumen production in 2022. Depreciation expense was $0.2 million and $0.8 million for the three and twelve months ended December 31, 2022 compared to $0.4 million and $1.3 million for the same period in 2021. Depreciation expenses decreased in 2022 primarily due to end of office lease term.

Impairment / (Reversal)

	For the three months ended December 31,		For the twelve months ended December 31,	
($ thousands, except $/bbl)	2022	2021	2022	2021
Impairment / (Reversal)	487,731	-	(375)	-

The Company assesses at each reporting date whether there is an indication that it's E&E (exploration and evaluation assets) and PP&E assets may be impaired or that historical impairment may be reversed. The Company's assets are aggregated into cash-generating units for the purpose of calculating impairment/impairment reversal. Cash generating units ("CGU"s) are based on an assessment of the units' ability to generate independent cash inflows. The company recognized impairment loss or reversal based on CGU which is identified with respect to geographical proximity, shared infrastructure and similarity of market risk exposure and materiality. The recoverable amount of the E&E and PP&E assets were determined using judgement and internal estimates. The recoverable amount is the higher of fair value less costs of disposal ("FVLCD") and value in use ("VIU"). FVLCD is the amount obtainable from the sale of an asset or CGU (cash-generating unit) in an arms-length transaction between knowledgeable, willing parties, less the costs of disposal. VIU is the present value of estimated future cash flows expected to arise from the continuing use of an asset or CGU and from the disposal at the end of its useful life.

During the year ended December 31, 2022, the Company identified indicators of impairment (reversal) in its Exploration and Evaluation (E&E) and West Ells CGU primarily due to higher commodity price sensitivity and changing interest rate expectations.

For the purpose of impairment (reversal) testing, recoverable amounts for each CGU were estimated based on FVLCD methodology which is calculated using the present value of the CGUs' expected future cash flows (after-tax). The cash flow information was derived from a report on the Group's oil and gas reserves which was prepared by an independent qualified reserve evaluator, GLJ Petroleum Consultants ("GLJ") and its latest oil price forecasts. The projected cash flows used in the FVLCD calculation reflect market assessments of key assumptions, including management forecast of long-term commodity prices, inflation rates, and foreign exchange rates (Level 3 fair value inputs). Cash flow forecasts are also based on GLJ's evaluation of the Group's reserves and resources to determine production profiles and volumes, operating costs, maintenance and future development capital expenditures. Future cash flows were discounted at a pre-tax rate of 16.92% for E&E CGU and 16.61% for West Ells CGU.

A reversal of an impairment loss shall be recognized immediately in profit or loss. In allocating a reversal of an impairment loss for a cash-generating unit, the carrying amount of an asset shall not be increased above the lower of:
(a) Its recoverable amount; and
(b) The carrying amount that would have been determined (net of amortization or depreciation) had no impairment loss been recognized for the asset in prior periods.

Future depletion expenses are adjusted to allocate the CGU's revised carrying amount over its remaining useful life.

As at December 31, 2022, the Company completed impairment (reversal) tests on its E&E CGU and West Ells CGU which resulted in an estimated recoverable value of $236.3 million and $497.6 million respectively based on FVLCD. The estimated recoverable amount of E&E CGU was lower than its carrying value resulting in an impairment of $19.7 million. The recoverable amount of West Ells CGU was above their carrying value, therefore an impairment reversal of $20.0 million was recorded for the year ended December 31, 2022.

CGU ($ thousands)	Estimated Recoverable Value as of December 31, 2022	Impairment / (Reversal) for the twelve months ended December 31, 2022
Exploration and Evaluation	236,347	19,653
West Ells	497,628	(20,028)
Total:	733,975	(375)

Year	Oilfield Costs Inflation %	Exchange 1 CAD = x USD	WTI @Cushing $US/bbl	WCS @ Hardisty $/bbl	Heavy Oil 12 API @Hardisty $/bbl	AECO Spot ($/MMbtu)
2023	0	0.735	75.00	65.65	54.54	4.36
2024	2	0.745	75.00	68.46	58.19	4.77
2025	2	0.755	75.43	73.42	64.87	4.47
2026	2	0.765	76.94	79.66	71.99	4.49
2027	2	0.775	78.48	81.91	74.71	4.53
2028	2	0.775	80.05	85.03	78.15	4.62
2029	2	0.775	81.65	86.83	79.86	4.71
2030	2	0.775	83.28	88.55	81.47	4.80
2031	2	0.775	84.95	90.34	83.13	4.89
2032	2	0.775	86.65	92.53	85.31	4.99
2032+	2	0.775	escalate oil, gas and product prices at 2% per year thereafter			

Income Taxes

The Company did not recognize any deferred income tax assets, which relate primarily to unrecognized tax losses, for the three and twelve months ended December 31, 2022 and 2021. Recognition of tax losses is based on the Company's consideration of its internal development plan for its asset base and the assumption as to whether or not these tax losses will be utilized before their expiry dates. At December 31, 2022, the Company had total available tax deductions of approximately $1.59 billion, with unrecognized tax losses that expire between 2029 and 2042.

Liquidity and Capital Resources

		December 31, 2022		December 31, 2021
Working capital deficiency	$	511,583	$	93,005
Shareholders' equity		110,009		176,367
	$	621,592	$	269,372

On May 12, 2022, the Company and the Forbearing Holder entered into another interest waiver agreement (the "Interest Waiver Agreement") pursuant to which the Forbearing Holder agrees to unconditionally and irrevocably waive the interest accrued between January 1, 2022 to December 31, 2022 at 10.0% per annum on the outstanding amounts (principal and interests) under the FRAA dated August 8, 2021 (the "Waiver of Interest") which amounted to US$31.5 million. Save as the Waiver of Interest, all other terms and conditions as stipulated in the FRAA remain unchanged.

As of December 31, 2022, the Company had incurred unsecured third party debt for a total of USD 50.6 million (CDN 68.6 million equivalent).

The Group has presented the Notes as a current liability on the Audited consolidated financial statements of Financial Position as at December 31, 2022.

The Group received a demand notice from the Regional Municipality of Wood Buffalo ("RMWB") in relation to the 2016-2022 municipal property taxes of CAD 13.7 million. The Group was also charged with overdue penalties of CAD 11.0 million. Since then the Group was in active negotiation with RMWB for a settlement plan with proposals to waive overdue penalties. As at the date of this report, the Group believes that notices issued by RMWB relating to property taxes did not comply with relevant legislation and the Company has sought judicial review to determine the effect of non-compliant tax notices on RMWB's property tax claim.

The Company is involved in various claims including claims described above and actions arising in the course of operations and is subject to various legal actions, pending claims and exposures. Litigation is subject to many uncertainties, and the outcome of individual matters is not predictable with assurance. Unfavorable outcome were to occur against such claims or pending claims, there exists the possibility of a material adverse impact on the Company's consolidated net income or loss in the period in which the outcome is determined. Accruals for litigation, claims and assessments are recognized if the Company determines that the loss is probable and the amount can be reasonably estimated. The Company believes it has made adequate provision for such claims. While fully supportable in the Company's view, some of these positions, if challenged may not be fully sustained on review. From time to time, the Company receives liens or claims on accounts payable balances, and the Company continues to work toward resolution of any liens or claims. At December 31, 2022, the Company had incurred $0.82 million (USD $0.61 million equivalent using the period end exchange rate) in Builders' liens (not related mineral leases) against them during the ordinary course of business.

The Company received a judgment from the Court of the State of New York, New York County (the "Judgment") that the Company shall pay the Non-forbearing holder all the amounts due and owing on the Senior Notes issued under the notes indenture dated 8 August 2014 (including principal and interests) in an aggregate amount of US$15,481,013.33. As at the date of this report, the Company has filed a motion to vacate the default judgment.

The Notes are translated into Canadian dollars at the year ended exchange rate of $1USD = $1.3544 CAD.

The Group's strategy is to access sufficient capital, through equity issuances, monetization, joint ventures and the utilization of debt, in order to maintain a capital base that properly supports the objectives of maintaining financial flexibility and of sustaining future development of the business. The Group manages its capital structure in order to continue as a going concern and makes adjustments relative to changes in economic conditions and the Group's risk profile. In order to manage risk, the Group may from time to time issue shares and adjust its capital spending to manage current working capital deficiency levels. The Group's liquidity may be adversely affected if the Group's access to the capital markets is hindered because of financial market conditions generally, or as a result of conditions specific to the Group.

For the twelve months ended December 31, 2022, the Company reported a net loss and comprehensive loss attributable to owner of the Company of $66.0 million. At December 31, 2022, the Company had a working capital deficiency of $511.6 million.

The Group's debt-to-asset ratio, measured on the basis of total liabilities divided by total assets was 85% as at December 31, 2022, compared to 77% as at December 31, 2021.

The Group is exposed to currency risks primarily through loan receivables, loans from related companies, other loans, senior notes and bank balances that are denominated in a foreign currency, i.e. a currency other than the functional currency of the operations to which the transactions relate. The foreign currencies giving rise to this risk are primarily Hong Kong dollar ("HK$"), United States dollar ("US$") and Renminbi ("RMB").

The following table details the Group's exposure as at the reporting date to currency risk arising from recognized assets or liabilities denominated in a currency other than the functional currency of the entity to which they relate.

	2022			2021		
	HK$ CAD'000	US$ CAD'000	RMB CAD'000	HK$ CAD'000	US$ CAD'000	RMB CAD'000
Assets						
Bank balances and cash	213	1	11	181	1	11
Loan receivables	12,861	-	-	12,286	-	-
Liabilities						
Loan from related companies	(35,645)	-	(18,204)	(20,533)	-	(21,089)
Loan from a share holder	(12,342)	-	-	-	-	-
Other loans	(16,238)	-	-	(13,564)	-	-
Senior notes	-	(269,040)	-	-	(251,838)	-
Interest payable	(5,976)	(176,942)	(4,482)	-	(169,886)	-
	(57,127)	(445,981)	(22,675)	(21,630)	(421,723)	(21,078)

The Group currently does not have a foreign currency hedging policy. However, management monitors foreign exchange exposure and will consider hedging of significant foreign currency exposure should the need arise.

Royalty Agreement

On August 31, 2021 (Calgary time), the Company entered into a Royalty Agreement (together with its ancillary documents, the "Royalty Agreement") with Burgess Energy Holdings, L.L.C. ("BEH"), pursuant to which, the Corporation has granted to BEH a royalty interest in the bitumen within, upon, under or produced from the royalty lands owned by the Corporation and/or its affiliates, free and clear of any and all encumbrances for an aggregate consideration of CAD 20,000,000 (the "Aggregate Consideration"), subject to the terms and conditions stipulated therein. The arrangement under the Royalty Agreement is perpetual.

Commitments and Contingencies

Management estimated the contractual maturities of the Group's obligations. These estimated maturities may differ significantly from the actual maturities of these obligations. For a detailed discussion regarding to the Group's commitments and contingencies, please refer to the Group's Audited Consolidated Financial Statements and notes thereto for the three and twelve months period ended December 31, 2022 and with the Audited Consolidated Financial Statements and notes thereto for the year ended December 31, 2021.

Transactions with Related Parties

For the twelve months ended December 31, 2022, a consulting company, to which a director of Sunshine is related, charged the Group CAD 0.5 million (December 31, 2021 – CAD 0.5 million) for management and advisory services.

As at December 31, 2022, Mr. Kwok Ping Sun, the Company's Executive Chairman, has beneficial ownership of, or control or direction of 150,232,591 common shares of the Company, which represents approximately 61.70% of the Company's outstanding common shares.

As at December 31, 2022, the Company had loans from related companies and a shareholder which are unsecured, interest bearing at 10% per annum, and of which approximately CAD 66,286,000 can be rolled over for a period of 1 to 3 years.

Off-balance Sheet Arrangements

As at December 31, 2022, the Group did not have any other off-balance sheet arrangements.

Subsequent Event

On January 31, 2023, the Company received a judgment from the Court of the State of New York, New York County (the "Judgment") that the Company shall pay the Non-forbearing holder all the amounts due and owing on the Senior Notes issued under the notes indenture dated 8 August 2014 (including principal and interests) in an aggregate amount of US$15,481,013.33. The Company is now actively seeking legal advice on appeal and state of execution of the Judgment and will adopt all effective measures to safeguard the interests of all the shareholders, the stakeholders and the Company.

On February 16, 2023, the Corporation and the Forbearing Holder entered into an interest waiver agreement (the "Interest Waiver Agreement") pursuant to which the Forbearing Holder agrees to unconditionally and irrevocably waive the interest accrued between January 1, 2023 and December 31, 2023 (the "Waiver of Interest"). Based on the Forbearance Reinstatement and Amending Agreement ("FRAA") dated August 8, 2021, the waived interest calculated at 10.0% per annum on the outstanding amounts (principal and interests) amounted to US$31.5 million. Save as the Waiver of Interest, all other terms and conditions as stipulated in the FRAA remain unchanged.

Critical Accounting Policies and Estimates

The Group's critical accounting estimates are those estimates having a significant impact on the Group's financial position and operations and that require management to make judgments, assumptions and estimates in the application of IFRS. Judgements, assumptions and estimates are based on historical experience and other factors that management believes to be reasonable under current conditions. As events occur and additional information is obtained, these judgements, assumptions and estimates may be subject to change.

For a detailed discussion regarding to the Group's critical accounting policies and estimates, please refer to Note 4 to the consolidated annual financial statements for the year ended December 31, 2022

Risk Factors

The business of resource exploration, development and extraction involves a high degree of risk. Material risks and uncertainties affecting the Group, their potential impact and the Group's principal risk management strategies are substantially unchanged from those disclosed in the Group's MD&A for the year ended December 31, 2022. The 2022 annual report of the Group will be available at the Group's website at www.sunshineoilsands.com, and the website of the SEHK, www.hkexnews.hk.

Disclosure Controls and Procedures

Gloria Ho, Executive Director of the Board and Chief Financial Officer and Mr.Jiangping Sun, Chief Executive Officer, have designed, or caused to be designed under their supervision, disclosure controls and procedures ("DC&P") to provide reasonable assurance that: (i) material information relating to the Group is made known to the Group's CFO by others, particularly during the period in which the annual and quarterly filings are being prepared; and (ii) information required to be disclosed by the Group in its annual filings, interim filings or other reports filed or submitted by it under securities legislation is recorded, processed, summarized and reported within the time period specified in securities legislation. As at December 31, 2022, the Chief Financial Officer and the Chief Executive Officer evaluated the design and operation of the Group's DC&P. Based on that evaluation, the Executive Director of the Board and the Chief Financial Officer and the Chief Executive Officer concluded that the Group's DC&P were effective as at December 31, 2022.

Internal Controls over Financial Reporting

Gloria Ho, Executive Director of the Board and Chief Financial Officer and Mr. Jiangping Sun, Chief Executive Officer, have designed, or caused to be designed under their supervision, internal controls over financial reporting ("ICFR") to provide reasonable assurance regarding the reliability of the Group's financial reporting and the preparation of financial statements for external purposes in accordance with IFRS. Furthermore, the Group used the criteria established in "Internal Control – Integrated Framework" published by the Committee of Sponsoring Organizations of the Treadway Commission (2013 Framework); they have evaluated, or caused to be evaluated under their supervision, the effectiveness of the Group's ICFR at December 31, 2022, and concluded that the Group's ICFR are effective at December 31, 2022 for the foregoing purpose.

No material changes in the Group's ICFR were identified during the three months and year ended December 31, 2022 that have materially affected, or are reasonably likely to materially affect, the Group's ICFR. It should be noted that a control system, including the Group's disclosure and internal controls and procedures, no matter how well conceived, can provide only reasonable, but not absolute, assurance that the objectives of the control system will be met and it should not be expected that the disclosure and internal controls and procedures will prevent all errors or fraud. In reaching a reasonable level of assurance, management necessarily is required to apply its judgment in evaluating the cost/benefit relationship of possible controls and procedures.

ADVISORY SECTION

Non-GAAP Measures

This MD&A includes references to certain measures which do not have a standardized meaning as prescribed by IFRS, such as “operating netbacks” and “Cash flow used in operations”, and therefore are considered non-GAAP measures. These non-GAAP measures are commonly used in the oil and gas industry and the Group believes including such measures is useful to investors. Investors are cautioned that these non-GAAP measures should not be construed as an alternative to measures calculated in accordance with IFRS as, given the non-standardized meanings, these measures may not be comparable to similar measures presented by other issuers.

Cash Flow Used in Operations

Cash flow used in operations is non-GAAP measure utilized by the Group to analyze operating performance and liquidity. Cash flow used in operations excludes the net change in non-cash operating working capital and decommissioning expenditures while the IFRS measurement “Net cash used in operating activities” includes these items. Cash flow used in operations is reconciled to Net cash used in operating activities in the table below:

	For the three months ended December 31,		For the twelve months ended December 31,	
($ thousands)	2022	2021	2022	2021
Net cash used in operating activities	$ (5,231)	$ (12,070)	$ (21,325)	$ (9,893)
Add: Net change in non-cash operating working capital items	(1,144)	7,037	(2,668)	(5,266)
Cash flow used in operations	$ (6,375)	$ (5,033)	$ (23,993)	$ (15,159)

Forward-Looking Information

Certain statements in this MD&A are forward-looking statements that are, by their nature, subject to significant risks and uncertainties and the Group hereby cautions investors about important factors that could cause the Group’s actual results to differ materially from those projected in a forward-looking statement. Any statements that express, or involve discussions as to expectations, beliefs, plans, objectives, assumptions or future events or performance (often, but not always, through the use of words or phrases such as “will”, “expect”, “anticipate”, “estimate”, “believe”, “going forward”, “ought to”, “may”, “seek”, “should”, “intend”, “plan”, “projection”, “could”, “vision”, “goals”, “objective”, “target”, “schedules” and “outlook”) are not historical facts, are forward-looking and may involve estimates and assumptions and are subject to risks (including the risk factors detailed in this MD&A), uncertainties and other factors some of which are beyond the Group’s control and which are difficult to predict. Accordingly, these factors could cause actual results or outcomes to differ materially from those expressed in the forward-looking statements.

Since actual results or outcomes could differ materially from those expressed in any forward-looking statements, the Group strongly cautions investors against placing undue reliance on any such forward-looking statements. Statements relating to “reserves” or “resources” are deemed to be forward-looking statements, as they involve the implied assessment, based on estimates and assumptions that the resources and reserves described can be profitably produced in the future. Further, any forward-looking statement speaks only as of the date on which such statement is made and the Group undertakes no obligation to update any forward-looking statement or statements to reflect events or circumstances after the date on which such statement is made or to reflect the occurrence of unanticipated events.

All forward-looking statements in this MD&A are expressly qualified by reference to this cautionary statement.

Additional Stock Exchange Information

Additional information required by the SEHK and not shown elsewhere in this report is as follows:

Code of Corporate Governance Practice (the "Code")

The Group is committed to maintaining high standards of corporate governance. The Group recognizes that corporate governance practices are fundamental to the effective and transparent operation of a Group and its ability to protect the rights of its shareholders and enhance shareholder value.

The Company confirms that the Code, as set out in Appendix 14 to the Rules Governing the Listing of Securities on the SEHK (the "Hong Kong Listing Rules"), has been complied with following its public listing, save that the Company is in course of identifying suitable insurers for appropriate insurance coverage for legal actions against the Company's Directors.

Compliance with the Model Code for Securities Transactions by Directors of Listed Companies (the "Model Code")

The Group confirms that it has adopted the Model Code, as set out in Appendix 10 to the Hong Kong Listing Rules, following its public listing. Having made specific enquiries with all directors, the directors have confirmed and compiled with the required standard set out in the Model Code and its code of conduct regarding directors' securities transactions.

Movements in Stock Options

The table below presents the movements in stock options for Directors, the chief executive and other executive management of the Group during the year ended December 31, 2022.

Name	**December 31, 2021**	**Granted**	**Exercised**	**Forfeited**	**Expired**	**December 31, 2022**
Kwok Ping Sun	6,000,000	-	-	-	-	6,000,000
Gloria Ho	300,000	-	-	-	-	300,000
Yi He	130,000	-	-	-	(30,000)	100,000
Guangzhong Xing	100,000	-	-	-	-	100,000
Sub-total for Directors	6,530,000	-	-	-	(30,000)	6,500,000
Sub-total for other share option holders	50,000	-	-	-	(50,000)	-
Total	6,580,000	-	-	-	(80,000)	6,500,000

Please refer to our consolidated financial statements included in the 2022 Annual Report for additional details on our stock option plans and movements for the year ended December 31, 2022.

Fair Value of Share Options Granted

The weighted average fair value of the share options in previous years was CAD 0.6 (2021 – CAD 0.60). Options were valued using the Black-Scholes model. Where relevant, the expected life used in the model has been adjusted based on management's best estimate for the effects of non- transferability, exercise restrictions (including the probability of meeting market conditions attached to the option), and behavioral considerations.

The table below details the input variables used in the Black-Scholes model to determine the fair value of options granted in previous years.

Input variables	**2022**	**2021**
Grant date share price ($)	0.60-2.00	0.60-2.50
Exercise price ($)	0.60-2.00	0.60-2.50
Expected volatility (%)	61.88-63.91	61.88-73.23
Option life (years)	0.76-1.95	0.26-2.69
Risk-free interest rate (%)	1.48-1.95	0.93-1.95
Expected forfeitures (%)	0-15.39	0-15.39

Purchase, Sale or Redemption of Sunshine's Listed Securities

Class "A" Common Shares

General mandate

2022 activity

There was not any purchase, sale or redemption of Sunshine's listed securities as of December 31, 2022.

2021 activity

In relation to the "Chairman CB" issued on June 15, 2020 (see "2020 activity" for details), Mr. Kwok Ping Sun has made application to the Securities & Futures Commission of Hong Kong ("HKSFC") for a Whitewash Waiver. The Whitewash Waiver was conditionally granted by HKSFC on March 4, 2021. The Conversion and the Whitewash Waiver has been approved by the independent shareholders at the Special General Meeting on March 5, 2021. On April 7, 2021, the Conversion was completed and 113,924,051 new shares were duly allotted and issued to the Subscriber.

Shares Outstanding

As at December 31, 2022 the Group has 243,478,681 Class "A" common shares issued and outstanding.

Employees

As at December 31, 2022, the Group has 33 full-time employees. For the three and twelve months ended December 31, 2022, total staff costs amounted to $1.0 million and $4.8 million, respectively.

Dividends

The Group has not declared or paid any dividends in respect of the year ended December 31, 2022 (year ended December 31, 2021 - $Nil).

Review of Annual Results

The audited consolidated financial statements for the Group for the three and twelve months ended December 31, 2022, were reviewed by the Audit Committee of the Group and approved by the Board.

Publication of Information

This annual results announcement is published on the websites of the SEHK (www.hkexnews.hk) and the Group's website at www.sunshineoilsands.com.

This announcement is prepared in both English and Chinese and in the event of inconsistency, the English text of this report shall prevail over the Chinese text.

Outlook

Sunshine will continue to focus on cost controls and carefully monitor developments in crude oil markets as well as the development of COVID-19 pandemic in North America. During the year, the Corporation's West Ells project has fully resumed production. The Corporation is working with its joint venture partner for re-activation of the Muskwa and Godin Area activities.