Next Hydrogen Solutions Inc.

Consolidated Financial Statements

For the years ended December 31, 2023 and 2022

INDEPENDENT AUDITOR'S REPORT

To the Board of Directors of Next Hydrogen Solutions Inc.,

Opinion

We have audited the consolidated financial statements of Next Hydrogen Solutions Inc. (the Entity), which comprise:

- the consolidated statements of financial position as at December 31, 2023 and December 31, 2022
- the consolidated statements of net loss and comprehensive loss for the years then ended
- the consolidated statements of changes in shareholder's equity (deficit) for the years then ended
- the consolidated statements of cash flows for the years then ended
- and notes to the consolidated financial statements, including a summary of material accounting policy information.

(Hereinafter referred to as the "financial statements").

In our opinion, the accompanying financial statements present fairly, in all material respects, the consolidated financial position of the Entity as at December 31, 2023 and December 31, 2022, and its consolidated financial performance and its cash flows for the years then ended in accordance with IFRS Accounting Standards as issued by the International Accounting Standards Board.

Basis for Opinion

We conducted our audit in accordance with Canadian generally accepted auditing standards. Our responsibilities under those standards are further described in the "***Auditor's Responsibilities for the Audit of the Financial Statements***" section of our auditor's report.

We are independent of the Entity in accordance with the ethical requirements that are relevant to our audit of the financial statements in Canada, and we have fulfilled our other ethical responsibilities in accordance with these requirements.

We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our opinion.

Key Audit Matters

Key audit matters are those matters that, in our professional judgment, were of most significance in our audit of the financial statements for the year ended December 31, 2023. These matters were addressed in the context of our audit of the financial statements, and in forming our opinion thereon, and we do not provide a separate opinion on these matters.

We have determined the matters described below to be the key audit matters to be communicated in our auditor's report.

Evaluation of Liquidity Assessment

Description of the matter

We draw attention to Notes 2 and 23 to the financial statements. The Entity believes that it has sufficient available liquidity to meet its minimum obligations as they come due for a period of at least 12 months from December 31, 2023. In making this significant judgment, the Entity has prepared a cash flow forecast with the most significant assumptions in the preparation of such forecast being (1) the ability to meet the relevant criteria of government grants and revenue contracts for additional funds to be received; and (2) judgment to curtail certain discretionary expenditures, if required, in fiscal 2024.

Why the matter is a key audit matter

We identified the evaluation of liquidity assessment as a key audit matter. This matter required significant auditor judgment in assessing the Entity's cash flow forecast due to the degree of uncertainty in the most significant assumptions.

How the matter was addressed in the audit

The primary procedures we performed to address this key audit matter included the following:

We assessed the Entity's significant assumptions with respect to cash inflows by inspecting relevant criteria in government grants and revenue contracts and evaluating management's plans to meet the relevant criteria to receive additional funds. In addition, we inspected cash receipts received subsequent to December 31, 2023, related to these government grants and revenue contracts.

We assessed the Entity's significant assumption with respect to judgment to curtail certain discretionary expenditures by evaluating management's plans to curtail expenditures.

We assessed the disclosures related to the Entity's significant judgment with respect to their assessment that the Entity has sufficient available liquidity to meet its minimum obligations as they come due to continue as a going concern for a period of at least the next 12 months from December 31, 2023.

Other Information

Management is responsible for the other information. Other information comprises:

- the information included in Management's Discussion and Analysis filed with the relevant Canadian Securities Commissions.

Our opinion on the financial statements does not cover the other information and we do not and will not express any form of assurance conclusion thereon.

In connection with our audit of the financial statements, our responsibility is to read the other information identified above and, in doing so, consider whether the other information is materially inconsistent with the financial statements, or our knowledge obtained in the audit and remain alert for indications that the other information appears to be materially misstated.

We obtained the information included in Management's Discussion and Analysis filed with the relevant Canadian Securities Commissions as at the date of this auditor's report. If, based on the work we have performed on this other information, we conclude that there is a material misstatement of this other information, we are required to report that fact in the auditor’s report.

We have nothing to report in this regard.

Responsibilities of Management and Those Charged with Governance for the Financial Statements

Management is responsible for the preparation and fair presentation of the financial statements in accordance with IFRS Accounting Standards as issued by the International Accounting Standards Board, and for such internal control as management determines is necessary to enable the preparation of financial statements that are free from material misstatement, whether due to fraud or error.

In preparing the financial statements, management is responsible for assessing the Entity’s ability to continue as a going concern, disclosing as applicable, matters related to going concern and using the going concern basis of accounting unless management either intends to liquidate the Entity or to cease operations, or has no realistic alternative but to do so.

Those charged with governance are responsible for overseeing the Entity’s financial reporting process.

Auditor’s Responsibilities for the Audit of the Financial Statements

Our objectives are to obtain reasonable assurance about whether the financial statements as a whole are free from material misstatement, whether due to fraud or error, and to issue an auditor’s report that includes our opinion.

Reasonable assurance is a high level of assurance but is not a guarantee that an audit conducted in accordance with Canadian generally accepted auditing standards will always detect a material misstatement when it exists.

Misstatements can arise from fraud or error and are considered material if, individually or in the aggregate, they could reasonably be expected to influence the economic decisions of users taken on the basis of the financial statements.

As part of an audit in accordance with Canadian generally accepted auditing standards, we exercise professional judgment and maintain professional skepticism throughout the audit.

We also:

- Identify and assess the risks of material misstatement of the financial statements, whether due to fraud or error, design and perform audit procedures responsive to those risks, and obtain audit evidence that is sufficient and appropriate to provide a basis for our opinion.
- The risk of not detecting a material misstatement resulting from fraud is higher than for one resulting from error, as fraud may involve collusion, forgery, intentional omissions, misrepresentations, or the override of internal control.
- Obtain an understanding of internal control relevant to the audit in order to design audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of the Entity's internal control.

- Evaluate the appropriateness of accounting policies used and the reasonableness of accounting estimates and related disclosures made by management.
- Conclude on the appropriateness of management's use of the going concern basis of accounting and, based on the audit evidence obtained, whether a material uncertainty exists related to events or conditions that may cast significant doubt on the Entity's ability to continue as a going concern. If we conclude that a material uncertainty exists, we are required to draw attention in our auditor's report to the related disclosures in the financial statements or, if such disclosures are inadequate, to modify our opinion. Our conclusions are based on the audit evidence obtained up to the date of our auditor's report. However, future events or conditions may cause the Entity to cease to continue as a going concern.
- Evaluate the overall presentation, structure, and content of the financial statements, including the disclosures, and whether the financial statements represent the underlying transactions and events in a manner that achieves fair presentation.
- Communicate with those charged with governance regarding, among other matters, the planned scope and timing of the audit and significant audit findings, including any significant deficiencies in internal control that we identify during our audit.
- Provide those charged with governance with a statement that we have complied with relevant ethical requirements regarding independence and communicate with them all relationships and other matters that may reasonably be thought to bear on our independence, and where applicable, related safeguards.
- Obtain sufficient appropriate audit evidence regarding the financial information of the entities or business activities within the group Entity to express an opinion on the financial statements. We are responsible for the direction, supervision, and performance of the group audit. We remain solely responsible for our audit opinion.
- Determine, from the matters communicated with those charged with governance, those matters that were of most significance in the audit of the financial statements of the current period and are therefore the key audit matters. We describe these matters in our auditor's report unless law or regulation precludes public disclosure about the matter or when, in extremely rare circumstances, we determine that a matter should not be communicated in our auditor's report because the adverse consequences of doing so would reasonably be expected to outweigh the public interest benefits of such communication.

KPMG LLP

Chartered Professional Accountants, Licensed Public Accountants

The engagement partner on the audit resulting in this auditor's report is David Denis Kerrigan Brownridge.

Toronto, Canada

April 19, 2024

NextHydrogen

Consolidated Statements of Financial Position

as at December 31, 2023 and 2022 (in Canadian dollars)

	December 31 2023	December 31 2022
Assets		
Current		
Cash and cash equivalents	**$ 10,909,061**	$ 22,084,721
Trade and other receivables (notes 3 and 18)	**1,510,334**	715,635
Prepaid expenses and deposits	**520,360**	398,110
Inventory (note 4)	**3,307,281**	2,885,854
	16,247,036	26,084,320
Trade and other receivables (notes 3 and 18)	**50,164**	73,720
Prepaid expenses and deposits	**94,578**	90,328
Equipment (note 5)	**6,817,421**	4,831,817
Right of use asset (note 6)	**1,509,462**	1,706,349
Patents (note 7)	**571,462**	668,444
Intangible assets and goodwill (note 8)	**153,195**	272,800
	$ 25,443,318	$ 33,727,778
Liabilities		
Current		
Bank indebtedness (note 11)	**$ -**	$ 60,000
Trade and other payables (note 9)	**1,714,482**	1,093,930
Contingent liability	**-**	14,968
Deferred revenue (note 10)	**2,307,894**	45,000
Deferred government grants (note 11)	**359,926**	-
Provisions (note 12)	**70,000**	97,245
Finance lease liability (note 13)	**90,734**	67,108
Long-term debt (note 14)	**62,850**	77,709
	4,605,886	1,455,960
Contingent liability	**-**	48,216
Deferred revenue (note 10)	**2,771,641**	2,726,641
Provisions (note 12)	**3,780,000**	3,752,755
Finance lease liability (note 13)	**1,657,339**	1,752,782
Long-term debt (note 14)	**22,539**	85,682
	12,837,405	9,822,036
Shareholders' Equity (Deficit)		
Share capital (notes 15 and 16)	**76,418,695**	76,393,695
Contributed surplus (note 17)	**5,959,992**	5,270,932
Retained deficit	**(69,772,774)**	(57,758,885)
	12,605,913	23,905,742
	$ 25,443,318	$ 33,727,778

On behalf of the Board

"Raveel Afzaal" *"Allan MacKenzie"*

Consolidated Statements of Net Loss and Comprehensive Loss

years ended December 31, 2023 and 2022 (in Canadian dollars)

	2023	2022
Revenue (note 22)	$ 951,908	$ 721,588
Expenses		
Cost of sales {includes $639,236 (2022 - $789,893) of provisions and inventory impairment} (notes 4 and 12)	1,240,702	1,433,651
Research and development (note 18)	7,065,384	7,705,005
General and administrative (note 18)	4,672,865	5,204,051
Marketing and sales	466,379	969,606
	13,445,330	15,312,313
Loss before the following	(12,493,422)	(14,590,725)
Finance (income) costs, net (note 19)	(479,533)	(312,357)
Net loss and comprehensive loss	$ (12,013,889)	$ (14,278,368)
Loss per share:		
Basic	$ (0.52)	$ (0.62)
Diluted	$ (0.52)	$ (0.62)
Weighted average number of shares outstanding: (note 16)		
Basic (note 16)	22,890,948	22,888,436
Diluted (note 16)	22,890,948	22,888,436

Consolidated Statements of Changes in Shareholders' Equity (Deficit)

years ended December 31, 2023 and 2022 (in Canadian dollars)

	Share Capital	Contributed Surplus	Retained Deficit	Total
Balances at December 31, 2022	$ 76,393,695	$ 5,270,932	$ (57,758,885)	$ 23,905,742
DSU exercise (note 17)	25,000	(25,000)	-	-
DSU issuance (notes 15 and 17)	-	112,500	-	112,500
Share-based compensation expense (note 17)	-	601,560	-	601,560
Net loss and comprehensive loss	-	-	(12,013,889)	(12,013,889)
Balances at December 31, 2023	$ 76,418,695	$ 5,959,992	$ (69,772,774)	$ 12,605,913
Balances at December 31, 2021	$ 76,393,695	$ 3,274,503	$ (43,480,517)	$ 36,187,681
DSU issuance (notes 15 and 17)	-	112,500	-	112,500
Share-based compensation expense (note 17)	-	1,883,929	-	1,883,929
Net loss and comprehensive loss	-	-	(14,278,368)	(14,278,368)
Balances at December 31, 2022	$ 76,393,695	$ 5,270,932	$ (57,758,885)	$ 23,905,742

Consolidated Statements of Cash Flows

years ended December 31, 2023 and 2022 (in Canadian dollars)

	2023	2022
Cash flows used in operating activities		
Net loss	$ (12,013,889)	$ (14,278,368)
Adjustments:		
Finance (income) costs, net (note 19)	(479,533)	(312,357)
Depreciation and amortization	872,379	708,129
Inventory impairment and provisions (note 4)	639,236	789,893
Goodwill impairment (note 8)	82,204	-
Share-based compensation (note 17)	601,560	1,883,929
Government grant (note 11)	(20,000)	-
Deferred share unit expense (note 15)	112,500	112,500
	(10,205,543)	(11,096,274)
Net change in non-cash operating working capital (note 21)	1,266,882	(2,100,107)
	(8,938,661)	(13,196,381)
Interest received (note 19)	715,397	560,282
	(8,223,264)	(12,636,099)
Cash flows used in investing activities		
Acquisition of equipment (note 5)	(2,525,938)	(4,028,334)
Patent costs (note 7)	(775)	(7,737)
	(2,526,713)	(4,036,071)
Cash flows from financing activities		
Repayment of long-term debt (note 14)	(82,293)	(146,220)
Repayment of bank indebtedness (note 14)	(40,000)	-
Payment of finance lease liability (note 13)	(303,390)	(294,246)
	(425,683)	(440,466)
(Decrease) increase in cash and cash equivalents	(11,175,660)	(17,112,636)
Cash and cash equivalents, beginning	22,084,721	39,197,357
Cash and cash equivalents, ending	$ 10,909,061	$ 22,084,721

1. CORPORATE INFORMATION

Next Hydrogen Solutions Inc. ("Next Hydrogen" or the "Company") was incorporated on February 11, 2014 under the British Columbia Business Corporations Act and its registered head office is at 6610 Edwards Blvd, Mississauga, Ontario, L5T 2V6.

Founded in 2007, the Company is a designer and manufacturer of electrolyzers that use water and electricity as inputs to generate clean hydrogen for use as an energy source. Next Hydrogen's unique cell design architecture supported by 40 patents enables high-current density operations and superior dynamic response to efficiently convert intermittent renewable electricity into green hydrogen on an infrastructure scale. Next Hydrogen is scaling up its technology to deliver commercial solutions to decarbonize transportation and industrial sectors.

The Company's registered head office is at 6610 Edwards Blvd, Mississauga, Ontario, L5T 2V6. The Company changed its name from "BioHEP Technologies Ltd." to "Next Hydrogen Solutions Inc." on June 24, 2021.

The common shares of the Company trade on the TSX Venture Exchange under the symbol "NXH" and on the OTCQX under the symbol "NXHSF".

2. MATERIAL ACCOUNTING POLICIES

Statement of Compliance

These consolidated financial statements have been prepared in accordance with IFRS Accounting Standards ("IFRS"), as issued by the International Accounting Standards Board ("IASB").

These consolidated financial statements were approved and authorized for issue by the Board of Directors on April 19, 2024.

Basis of Measurement

These consolidated financial statements have been prepared on a going concern basis using historical cost, except for financial instruments recorded at fair value.

Functional and Presentation Currency

These consolidated financial statements are presented in Canadian dollars, which is the Company's functional currency. All financial information presented has been rounded to the nearest dollar, except per share amounts and where otherwise indicated.

Basis of Consolidation

The consolidated financial statements consolidate the accounts of the Company and its subsidiaries, Next Hydrogen Corporation and Next Hydrogen USA, Inc. Subsidiaries are entities over which the Company has the power to govern financial and operating policies. Subsidiaries are fully consolidated from the date on which control is obtained by the Company, and are de-consolidated from the date control ceases. Fully consolidated means that all transactions with subsidiaries and any intercompany balances, gains or losses with subsidiaries have been eliminated on consolidation. The accounting policies have been applied consistently by all subsidiaries.

The Company's subsidiaries are wholly-owned, are in product development for the renewable energy industry and are domiciled in Canada and the United States, respectively.

Revenue Recognition

Revenue from contracts with customers

The company generates revenue from customer contracts from three principal sources: (1) product and equipment sales; (2) services as well as aftermarket sales; and (3) development contracts. Product and equipment sales are generated from standard products.

Revenue is recognized when control of the goods or services are transferred to the customer and is measured based on the consideration to which the company expects to be entitled as specified in the contract with the customer.

Based on the specific contract and its obligations, revenue is recognized either at a point in time or over time.

Revenue from sale of standard products and equipment

The Company recognizes revenue at the point in time at which it satisfies a performance obligation by transferring the control of a good or service to the customer, which is generally at the time the equipment is installed at the customer's location and ready for use. The customer has control of a good or service when it has the ability to direct the use of and obtain substantially all of the remaining benefits from the good or service. The point in time measurement basis is the main method of recognizing revenue relating to electrolyzers and balance of plant equipment.

In circumstances where the cost directly related to a contract is expected to exceed the directly related revenues, the estimated loss on the contract will be recognized in its entirety in the period when this is identified.

The Company periodically enters into arrangements with customers that involve multiple elements. The Company assesses such contracts to evaluate whether there are multiple performance obligations and whether the transaction price under the arrangement is being appropriately allocated to each of the performance obligations.

Service and aftermarket sales

For contracts where the Company has agreed to provide routine maintenance services and warranty services over a period of time as part of the original contract, a portion of the transaction price is allocated to these performance obligations and revenue is recognized evenly over the contract period.

For sales of aftermarket parts, revenue is recognized when the performance obligation is satisfied, generally upon delivery of parts.

The Company accounts for a significant financing component on contracts where timing of cash receipts and revenue recognition differ substantially. The contracts typically require the customer to pay the full contract value by the time the product is ready for use, which is well before the delivery of maintenance and warranty services and therefore a financing component is accounted for separately. The result is that interest expense is accrued during the advance period and the transaction price will be increased by a corresponding amount.

Revenue from development contracts

The Company enters into development contracts with customers from time to time, which consists of multiple milestones, ranging from design to inspection, and from installation to testing. The Company recognizes revenue over time as services are provided. The stage of completion for determining the amount of revenue to be recognized is measured by the milestones and the weighting of the hours to complete each of the milestones as determined by the scope of the project. The contract price is allocated to these performance obligations and revenue is recognized over the contract period. Advances received are included in deferred revenue.

In circumstances where the cost directly related to a contract is expected to exceed the directly related revenues, the estimated loss on the contract will be recognized in its entirety in the period when this is identified.

Deferred Revenue

Deferred revenue is the obligation to transfer goods or services to a customer for which the Company has received consideration from the customer. If a customer pays consideration before the Company transfers goods or services to the customer, a deferred revenue liability is recognized when the payment is made. Deferred revenue liabilities are recognized as revenue when the Company meets its performance obligations under the contract. Advances received are included within deferred revenue.

Financial Instruments

Financial instruments are initially recognized at fair value and are subsequently measured at either (i) amortized cost, (ii) fair value through other comprehensive income ("FVTOCI"), or (iii) fair value through profit or loss ("FVTPL"), based on the Company's business models for managing its financial assets and whether the contractual cash flows represent solely payments of principal and interest.

Financial instruments classified and measured at amortized cost are those assets that are held within a business model whose objective is to hold financial assets in order to collect contractual cash flows, and the contractual terms of the financial asset give rise to cash flows that are solely payments of principal and interest. Financial instruments classified at amortized cost are initially measured at fair value, plus adjustments for transaction costs, and subsequently amortized using the effective interest method. Financial instruments measured at amortized cost include: cash and cash equivalents, trade and other receivables (excluding sales taxes), bank indebtedness, trade and other payables, long-term debt and finance lease liability.

Financial instruments classified and measured at FVTPL are those assets and liabilities that do not meet the criteria to be classified at amortized cost or at FVTOCI. This category includes debt instruments whose cash flow characteristics are not solely payments of principal and interest, or are not held within a business model whose objective is achieved through contractual cash flows or through both contractual cash flows and through the selling of the financial instrument. Financial instruments classified at FVTPL are initially measured at fair value and subsequently carried at fair value, with changes in fair value recorded through profit or loss. Transaction costs are expensed as incurred through profit and loss. Financial instruments measured at FVTPL include deferred share unit liability and contingent liability.

The Company derecognizes a financial asset when the contractual rights to the cash flows from the asset expire, or it transfers the right to receive the contractual cash flows on the financial asset in a transaction in which substantially all the risks and rewards of ownership of the financial asset are transferred. The Company derecognizes a financial liability when its contractual obligations are discharged, cancelled or expired.

Financial assets and liabilities are offset and the net amount presented in the consolidated statements of financial position when, and only when, the Company has a legal right to offset the amounts and intends either to settle on a net basis or to realize the asset and settle the liability simultaneously.

The impairment model under IFRS 9 is applicable to financial assets measured at amortized cost where any expected future credit losses are provided for, irrespective of whether a loss event has occurred as at the reporting date. The Company's only financial asset subject to impairment are trade and other receivables (excluding sales taxes), which are measured at amortized cost. The Company uses specific account identification to estimate lifetime expected impairment. Losses are recognized in profit and loss and reflected as an expected credit loss allowance against the financial asset. When a subsequent event causes the amount of the allowance to decrease, the decrease in allowance is reversed through profit and loss.

Cash and cash equivalents

Cash and cash equivalents are comprised of cash and highly liquid investments that are readily convertible into known amounts of cash.

Inventory

Inventory is made up of parts purchased for the assembly of the Company's electrolyzers and balance of plant equipment and is measured at the lower of cost and net realizable value, with cost being determined on a first in, first out basis. Net realizable value represents the estimated selling price less all estimated costs of completion and selling costs.

Equipment

Equipment is measured at cost less accumulated depreciation and accumulated impairment losses. Cost includes costs that are directly attributable to bringing the asset to a working condition for its intended use. When significant components of an item of equipment have different useful lives, they are accounted for as separate items of equipment. Gains and losses on disposal of equipment are determined by comparing the proceeds from disposal with the carrying amount of equipment and the net is recognized within profit or loss.

Depreciation is recognized in profit or loss on straight line basis over the estimated useful lives of equipment, which most closely reflects the expected pattern of consumption of the future economic benefits embodied in the asset. Depreciation methods, useful lives and residual values are reviewed each year and adjusted prospectively, if appropriate. Depreciation is provided for using the following useful lives:

Computer hardware	3 years
Equipment	10 years
Furniture and fixtures	10 years
Leasehold improvements	10 years

At each reporting date, the Company reviews the carrying amounts of its non-financial assets to determine whether there is any indication of impairment.

Intangible Assets and Patents

Intangible assets are measured at cost less accumulated amortization and accumulated impairment losses. If intangible assets are acquired through a business combination, costs are measured at the estimated fair value on acquisition. For other intangible assets, costs include any costs necessary to create, produce, and prepare the asset to be capable of operating in the manner intended by management. Intangible assets with finite useful lives are amortized on a straight-line basis over their estimated useful lives and recorded on the consolidated statements of net loss and comprehensive loss. The Company assesses the useful lives, residual values and amortization methods annually and recognize the effects of changes in estimates in the consolidated statements of net loss and comprehensive loss prospectively.

Amortization of intangible assets is provided for using the following useful lives:

Licensing agreement	2 years
Non-competition agreement	2 years
Customer list	11 years
Patents	8 - 22 years

Intangible assets are assessed for impairment annually, or more frequently if events or circumstances indicate that the asset might be impaired. If there is any indication of impairment, the carrying amount of the asset is compared to its recoverable amount and any excess is charged to earnings or loss.

Finance lease liabilities and right of use assets

At the inception of a contract, a right-of-use asset and a lease liability is recognized at the lease commencement date when the contract conveys the right to control the use of an identified asset for a period of time in exchange for considerations.

The asset is initially measured at cost, comprised of the initial amount of the lease liability adjusted for any pre-commencement lease payments, plus any initial direct costs incurred. The asset is subsequently depreciated using the straight-line method from the commencement date of the lease to the end of the useful life of the asset if the lease transfers ownership of the underlying asset by the end of the lease term, or the right of use asset reflects that the Company will exercise a purchase option. Otherwise, the asset is depreciated using the straight-line method from the commencement date of the lease to the end of the lease term. The estimated useful lives of leased assets are determined on the same basis as those of property and equipment. The carrying amount of the leased asset is adjusted by remeasurement of the lease liability and reduced by impairment losses, if any.

The lease liability is initially measured at the present value of future lease payments, less any lease incentive received, discounted using the interest rate implicit in the lease, or, if that rate cannot be readily determined, the Company's incremental borrowing rate. The lease liability is subsequently measured at amortized cost using the effective interest method. In the event of a change in the Company's assessment of whether it will exercise a purchase, extension or termination option, the lease liability will be remeasured and an adjustment will be made to the carrying amount of the right-of-use asset, or recognized in the consolidated statements of net loss and comprehensive loss if the carrying value of the leased asset is zero.

Provisions

Provisions are recognized when the Company has a material obligation, whether existing or potential, as a result of a past event and it is probable that an outflow of economic benefits will be required to settle the obligation. If the obligation is determined to be material, then the estimated amount of the provision is determined by discounting the expected future cash flows.

Warranties

Provisions for the expected cost of warranty obligations are recognized at the date of sale of the relevant products or at the time the obligation was committed to, and is recognized at management's best estimate of the expenditures required to settle the Company's obligation.

Onerous Contracts

Certain of the Entity's sales contracts are onerous contracts as the unavoidable costs of meeting the obligations under the contract exceed the economic benefits expected to be received under the contract.

If it is more likely than not that the unavoidable costs of meeting the obligations under a firm contract exceed the economic benefits expected to be received under it, a provision for onerous contracts is recorded as an expense, with the interest component being recorded as a financing expense. Unavoidable costs include the costs that relate directly to the contract such as anticipated cost overruns, expected costs associated with late delivery penalties and technological problems, as well as allocations of costs that relate directly to the contract. Provisions for onerous contracts are measured at the lower of the expected cost of fulfilling the contract and the expected cost of exiting the contract.

Deferred Share Units

The expense associated with the Company's deferred share unit ("DSU") plan is determined based on the market price of the Company's common shares on the grant date. The expense is recognized in the consolidated statements of net loss and comprehensive loss in the period in which the units are granted with a corresponding equity component recorded on the consolidated statements of financial position. Each DSU entitles its holder to receive one common share upon settlement and vests over one year.

Share Capital

Common shares are classified as equity. Incremental costs directly attributable to the issuance of common shares, stock options and warrants are recognized as a deduction from equity, net of any tax effects. When share capital recognized as equity is repurchased, the amount of consideration paid, including direct costs, net of tax effects, is recognized as a deduction from equity.

Share-Based Compensation and Warrants

The grant date fair value of share-based payment awards granted is recognized as an expense, with a corresponding increase in contributed surplus, over the period that the individual becomes entitled to the awards. The fair value of stock options and warrants granted is determined using the Black-Scholes option pricing model. The fair value of deferred share units granted is determined using the fair value of the Company's common shares on the date of grant. The amount recognized as an expense is adjusted to reflect the number of awards for which the related service conditions are expected to be met, such that the amount ultimately recognized as an expense is based on the number of awards that meet the related service performance conditions at the vesting date.

When stock option awards are exercised, the proceeds, together with the amount originally recorded in contributed surplus, are recorded in share capital.

Government Grants

The Company uses the income-based approach to account for government grants. Government grants are initially recognized as deferred government grants at fair value when there is reasonable assurance that they will be received, and the Company will comply with the conditions associated with the grant. Grants that compensate the Company for expenses incurred are recognized in profit or loss as a reduction in the related expense on a systematic basis in the periods in which the expenses are recognized. Grants that compensate the Company for the cost of an asset are included within deferred government grants, and are recognized in profit or loss on a systematic basis over the useful life of the asset as reduced depreciation expense for the underlying asset.

Investment Tax Credits

Investment tax credits (“ITC”) are recognized where there is reasonable assurance that the ITC will be received and all attached conditions will be complied with. When the ITC relates to an expense item, it is netted against the related expense. Where the ITC relates to an asset, it reduces the carrying amount of the asset. The ITC is then recognized as income over the useful life of a depreciable asset by way of a reduced depreciation charge. The Company is actively engaged in research and product development (“R&D”) and, accordingly, has previously filed for ITC refunds under both the Canadian federal and Ontario provincial Scientific Research and Experimental Development (“SR&ED”) tax incentive programs.

The ITCs recorded in the accounts are based on management's interpretation of the Income Tax Act of Canada provisions, which govern the eligibility of R&D costs. The claims are subject to review by the Canada Revenue Agency and the Minister of Revenue for Ontario before the refunds can be released.

Research and Product Development

Expenditure on research activities undertaken with the prospect of gaining new scientific or technical knowledge and understanding are expensed as incurred.

Development activities that involve a plan or design for the production of new or substantially improved products and processes are capitalized only if development costs can be measured reliably, the product or process is technically and commercially feasible, future economic benefits are probable and the Company intends to and has sufficient resources to complete development and to use or sell the asset. All of the Company's development expenditures to date have been expensed as incurred.

Finance Costs

Finance costs are comprised of interest expense on bank indebtedness, long-term debt and finance lease liability, offset by interest income earned on cash and cash equivalents. Interest income or expense is recognized under the effective interest method.

Earnings (Loss) Per Share

Basic earnings (loss) per share is calculated by dividing the income or loss attributable to common shareholders of the Company by the weighted average number of common shares outstanding during the period. Diluted earnings (loss) per share is determined by adjusting the income or loss attributable to common shareholders and the weighted average number of common shares outstanding for the effects of all potentially dilutive common shares using the treasury stock method. The calculation of diluted loss per share excludes the effects of outstanding instruments that would be anti-dilutive.

Foreign Currency Translation

Transactions denominated in a foreign currency have been translated at the rate of exchange in effect on the date of the transaction. Monetary items included in the consolidated statement of financial position have been translated at the rate of exchange in effect as at the consolidated statement of financial position date. Realized and unrealized gains and losses on translations of foreign currencies are included in profit and loss.

Change in Accounting Standards

IFRS 17 Insurance Contracts

On May 18, 2017, the IASB issued IFRS 17 Insurance Contracts. On June 25, 2020, the IASB issued amendments to IFRS 17 aimed at helping companies implement the Standard and to defer the effective date. IFRS 17 will replace IFRS 4 Insurance Contracts.

On December 9, 2021, the IASB issued a narrow-scope amendment to the transition requirements in IFRS 17, providing insurers with an option aimed at improving the usefulness of information to investors on initial application of IFRS 17 by presenting comparative information about financial assets, using a classification overlay approach on a basis that is more consistent with how IFRS 9 will be applied in future reporting periods. The new standard and its amendments are effective for annual periods beginning on or after January 1, 2023.

The Company performed an assessment and determined this standard to have no effect on its consolidated financial statements.

Definition of Accounting Estimates [Amendments to IAS 8 Accounting Policies, Changes in Accounting Estimates and Errors ("IAS 8")]

In February 2021, the IASB issued amendments to IAS 8 to introduce a definition of "accounting estimates" and include other amendments to help entities distinguish changes in accounting estimates from changes in accounting policies. The amendments are effective for annual reporting periods beginning on or after January 1, 2023, with early adoption permitted. The amendments are to be applied prospectively.

The Company has adopted the amendment issued with no effect on the consolidated financial statements.

Disclosure of Accounting Policies (Amendments to IAS 1)

In February 2021, the IASB issued amendments to IAS 1 requiring an entity to disclose its material accounting policies, rather than its significant accounting policies. Additional amendments were made to explain how an entity can identify a material accounting policy. The amendments are effective for annual reporting periods beginning on or after January 1, 2023, with early adoption permitted.

The Company has considered this amendment and has made the necessary changes to its consolidated financial statements in accordance with this amendment.

Future Accounting Pronouncements

Classification of Liabilities as Current or Non-current [Amendments to IAS 1 Presentation of Financial Statements ("IAS 1")]

In January 2020, the IASB issued amendments to IAS 1 relating to the classification of liabilities as current or non-current. Specifically, the amendments clarify one of the criteria in IAS 1 for classifying a liability as non-current - that is, the requirement for an entity to have the right to defer settlement of the liability for at least twelve months after the reporting period. The amendments are effective for annual reporting periods beginning on or after January 1, 2024, with early adoption permitted. The amendments are to be applied retrospectively.

The Company will perform an assessment of this amendment on its consolidated financial statements to which the pronouncement applies.

Lease Liability in a Sale and Leaseback (Amendments to IFRS 16 Leases)

On September 22, 2022, the IASB issued Lease Liability in a Sale and Leaseback (Amendments to IFRS 16). The amendments are effective for annual periods beginning on or after January 1, 2024. Early adoption is permitted.

The Company will perform an assessment of this amendment on its consolidated financial to which the pronouncement applies.

Critical Accounting Estimates and Significant Judgments

The preparation of consolidated financial statements in accordance with IFRS requires management to make judgments that affect the application of accounting policies and the interpretation of accounting standards, and to make estimates and assumptions which affect the reported amounts of assets and liabilities, the disclosure of contingent assets and liabilities, and the reported amounts of revenues and expenses. Management makes estimates based on specific facts or circumstances as well as past experiences. Management periodically reviews its estimates and underlying assumptions and as adjustments become necessary, they are reported in profit and loss in the period in which they become known. Due to the inherent uncertainty involved with making such estimates, actual results could differ from those reported.

Judgements

a) *Revenue recognition*: In accounting for revenue, management must review each contract and allocate the transaction price to the various performance obligations based on the expected costs for each performance obligation.

b) *Impairment of patents*: Patents are tested for impairment annually or more frequently if events or changes in circumstances indicate that they might be impaired. In doing so, management must assess the future potential of its protected technology, and its ability to result in future benefit in the form of cost reductions or growth in revenues and profitability.

c) *Going Concern*: The financial statements were prepared on a going concern basis, which assumes that the Company will continue in operation for the foreseeable future and will be able to realize its assets and discharge its liabilities and commitments in the normal course of business. The assessment of going concern involves significant judgement based on historical experience and other factors including expectation of future events that are believed to be reasonable under the circumstances.

d) *Provisions*: In assessing revenue contracts, management must analyze each performance obligation, and determine the onerous component (if any) of each revenue stream, based on the allocation of transaction price to the various performance obligations based on the expected costs for each performance obligation.

Estimates

a) *Revenue recognition*: In accounting for revenue, management must review each contract and allocate the transaction price to the various performance obligations based on the expected costs for each performance obligation. The estimated costs are largely based on budgeted costs or quotes for costs and anticipated labour hours to complete the task.

b) *Provisions*: The Company evaluates the unavoidable costs related to fulfilling onerous contracts as of the reporting date. This involves identifying and measuring performance obligations, along with other costs resulting from contract termination or inability to fulfil the contract. Predictions about future events, analysis of contractual legal terms, and estimations regarding future cash flows require judgment. Alterations to these estimates and assumptions can considerably affect the recognized provision amount for onerous contracts.

c) *Share-based compensation*: The fair value of share-based compensation expense is estimated using the Black-Scholes option pricing model and relies on a number of estimates, such as the expected life of the option, the volatility of the underlying share price of similar companies and the risk-free rate of return.

d) *Depreciation and impairment of equipment*: Estimates of useful lives for depreciation is based on management's judgment of the expected productive lives and planned uses for each respective asset.

years ended December 31, 2023 and 2022 (in Canadian dollars)

3. TRADE AND OTHER RECEIVABLES

	Dec 31 2023	Dec 31 2022
Trade receivables	$ 1,428,596	$ 154,094
GST/HST receivable	56,655	527,313
Employee loan receivable	75,247	107,948
	$ 1,560,498	$ 789,355
Current portion	1,510,334	715,635
Long-term portion	50,164	73,720

The long-term portion of trade and other receivables is comprised of employee loans expected to be received by 2027.

4. INVENTORY

	Dec 31 2023	Dec 31 2022
Spare parts	$ 2,496,415	$ 1,858,841
Work in progress	810,866	1,027,013
	$ 3,307,281	$ 2,885,854

During the year, $639,236 (2022 - $789,893) was recorded as an inventory impairment.

years ended December 31, 2023 and 2022 (in Canadian dollars)

5. EQUIPMENT

	Equipment	Equipment Under Constr'n	Computer Hardware	Furniture and Fixtures	Leasehold Improv'ts	Total
Cost						
Balances, December 31, 2022	$ 4,244,010	$ 582,941	$ 202,010	$ 75,630	$ 296,230	$ 5,400,821
Additions	342	2,412,677	56,161	18,472	38,286	2,525,938
Transfers	839,656	(839,656)	-	-	-	-
Balances, December 31, 2023	5,084,008	2,155,962	258,171	94,102	334,516	7,926,759
Accumulated depreciation						
Balances, December 31, 2022	(449,987)	-	(83,900)	(8,767)	(26,350)	(569,004)
Depreciation	(428,032)	-	(71,443)	(9,079)	(31,780)	(540,334)
Balances, December 31, 2023	(878,019)	-	(155,343)	(17,846)	(58,130)	(1,109,338)
Net carrying amounts						
At December 31, 2023	$ 4,205,989	$ 2,155,962	$ 102,828	$ 76,256	$ 276,386	$ 6,817,421

	Equipment	Equipment Under Constr'n	Computer Hardware	Furniture and Fixtures	Leasehold Improv'ts	Total
Cost						
Balances, December 31, 2021	$ 666,430	$ 330,692	$ 139,157	$ 64,062	$ 172,452	$ 1,372,793
Additions	921,508	2,943,259	65,043	11,568	139,046	4,080,424
Transfers	2,691,010	(2,691,010)	-	-	-	-
Disposals	(34,938)	-	(2,190)	-	(15,268)	(52,396)
Balances, December 31, 2022	4,244,010	582,941	202,010	75,630	296,230	5,400,821
Accumulated depreciation						
Balances, December 31, 2021	(233,295)	-	(26,490)	(1,549)	(2,275)	(263,609)
Depreciation	(216,692)	-	(57,714)	(7,218)	(24,075)	(305,699)
Disposals	-	-	304	-	-	304
Balances, December 31, 2022	(449,987)	-	(83,900)	(8,767)	(26,350)	(569,004)
Net carrying amounts						
At December 31, 2022	$ 3,794,023	$ 582,941	$ 118,110	$ 66,863	$ 269,880	$ 4,831,817

years ended December 31, 2023 and 2022 (in Canadian dollars)

6. RIGHT-OF-USE ASSET

The right of use asset relates to a lease of the Company's head office and assembly facility, which started on September 1, 2021.

	Cost	Accumulated Amortization	Net
Balances, December 31, 2021	$ 1,968,864	$ (65,629)	$ 1,903,235
Amortization	-	(196,886)	(196,886)
Balances, December 31, 2022	1,968,864	(262,515)	1,706,349
Amortization	-	(196,887)	(196,887)
Balances, December 31, 2023	$ 1,968,864	$ (459,402)	$ 1,509,462

7. PATENTS

	Cost	Accumulated Amortization	Net
Balances, December 31, 2021	$ 1,047,197	$ (274,840)	$ 772,357
Additions	7,737	-	7,737
Amortization	-	(111,650)	(111,650)
Balances, December 31, 2022	1,054,934	(386,490)	668,444
Additions	775	-	775
Amortization	-	(97,757)	(97,757)
Balances, December 31, 2023	$ 1,055,709	$ (484,247)	$ 571,462

8. INTANGIBLE ASSETS AND GOODWILL

	Intangible Assets	Goodwill	Net
Balances, December 31, 2021	$ 284,490	$ 82,204	$ 366,694
Amortization	(93,894)	-	(93,894)
Balances, December 31, 2022	190,596	82,204	272,800
Impairment	-	(82,204)	(82,204)
Amortization	(37,401)	-	(37,401)
Balances, December 31, 2023	$ 153,195	$ -	$ 153,195

years ended December 31, 2023 and 2022 (in Canadian dollars)

9. TRADE AND OTHER PAYABLES

	Dec 31 2023	Dec 31 2022
Trade payables	$ 494,473	$ 56,699
Accrued payables	1,192,732	977,647
Other payables	27,277	59,584
	$ 1,714,482	$ 1,093,930

10. DEFERRED REVENUE

	Dec 31 2023	Dec 31 2022
Opening balance	$ 2,771,641	$ 3,027,941
Advance consideration	3,053,000	256,300
Revenue recognized	(745,106)	(512,600)
	$ 5,079,535	$ 2,771,641
Current portion	2,307,894	45,000
Long-term portion	2,771,641	2,726,641

11. GOVERNMENT GRANTS

In 2021, the Company obtained an interest-free and partially forgivable loan of $60,000 under the Canada Emergency Business Account ("CEBA") program. This was classified as bank indebtedness at December 31, 2022. The Company repaid $40,000 in 2023 and $20,000 was forgiven based on the terms of the CEBA program.

During 2023, the Company received a grant from Sustainable Development Technology Canada in the amount of $1,944,659 for its first milestone. As the grant has been provided with specific conditions, Next Hydrogen has implemented the income approach to recognizing the grant. Of the total grant, $1,584,733 has been offset against the related expenditure under research and development expenses during the year ended December 31, 2023. The remaining grant in the amount of $359,926 relates to equipment currently being constructed and will be offset against the depreciation of this equipment, once it is ready for use. This grant will be utilized for the development and demonstration of the Company's second and third-generation products and market demonstrations associated with these product lines. As per the grant agreement, the Company has three milestones to achieve, first of which has been completed, and the second milestone is currently in progress. Subsequent to year end, the Company received payment for the second milestone in the amount of $1,992,777, which denotes the official completion of the first milestone. Payment for the third milestone will be advanced to the Company upon completion of the second milestone. Finally, once all milestones have been completed, a 10% holdback will be released to the Company.

years ended December 31, 2023 and 2022 (in Canadian dollars)

During 2023, the Company also received a grant from the National Research Council of Canada under the Industrial Research Assistance Program (IRAP). The total grant approved is in the amount of $750,000, all of which has been offset against the related expenditure under research and development expenses during the year ended December 31, 2023. This grant was utilized to cover labour and consultant costs for our next generation product lines.

12. PROVISIONS

In previous years, the Company entered into revenue contracts which were concluded to be onerous in nature. The following onerous contract obligations have been recognized, consisting of the exit price of all such contracts:

	Dec 31 2023	Dec 31 2022
Opening balance	$ 3,850,000	$ 3,850,000
Additions	78,585	122,676
Utilized	(78,585)	(122,676)
	$ 3,850,000	$ 3,850,000
Current portion	70,000	97,245
Long-term portion	3,780,000	3,752,755

13. FINANCE LEASE LIABILITY

The finance lease liability relates to the lease of the Company's head office and assembly facility, which started on September 1, 2021. The lease expires on August 31, 2026 with an option to extend for an additional five years. The lease liability was initially valued at $1,872,412, using a weighted average incremental borrowing rate of 14%, and the obligation is as follows:

	Less than 1 Year	1 to 5 Years	More than 5 Years	Total
Future minimum lease payments	$ 312,265	$ 1,439,729	$ 1,079,194	$ 2,831,188
Interest	(221,531)	(696,145)	(165,439)	(1,083,115)
	$ 90,734	$ 743,584	$ 913,755	$ 1,748,073
Current portion				90,734
Long-term portion				1,657,339

years ended December 31, 2023 and 2022 (in Canadian dollars)

14. LONG-TERM DEBT

Long-term debt pertains to grant loans that accrue interest at a blended rate of 3.72%, with blended monthly installments of $5,411. The long-term debt is secured by a second-ranking general security agreement over all assets of the Company.

	Less than 1 Year	1 to 5 Years	More than 5 Years	Total
Principal repayments	$62,850	$22,539	$ -	$85,389

15. DEFERRED SHARE UNIT

The Company had a deferred share unit ("DSU") plan for certain employees, directors and consultants that was administered by the Board of Directors and could have been settled in cash or equity. In July 2022, 135,288 DSUs were issued to the board of directors in settlement of directors' fees owing of $225,000, which vested on July 1, 2023; no DSUs were issued during 2023. Each DSU entitles its holder to receive one common share upon settlement and vests over one year. Included in Contributed Surplus is a DSU component in the amount of $112,500 to reflect the DSUs issued to the board of directors in July 2022, given that the board of directors are paid one year in advance of providing services, and during 2023, 6 months worth of services compensated via DSUs have been provided by the directors. During 2023, 15,032 (2022 - NIL) DSUs were settled in shares; therefore, 120,256 DSUs were outstanding as at December 31, 2023.

16. SHARE CAPITAL

Authorized

Unlimited number of common shares with no par value.

	Common Shares #	Share Capital $
Issued		
Balances, December 31, 2021	22,888,436	76,393,695
Balances, December 31, 2022	22,888,436	76,393,695
Settlement of DSUs	15,032	25,000
Balances, December 31, 2023	22,903,468	76,418,695

During the year, there were no stock option exercises (2022 - NIL), hence there were no gross proceeds (2022 - $NIL) received as a result.

years ended December 31, 2023 and 2022 (in Canadian dollars)

The Company has 22,903,468 common shares issued and outstanding as at December 31, 2023. During the year, 15,032 (2022 - NIL) shares were issued as settlement for DSUs. There were no (2022 - NIL) shares cancelled during the period. The weighted average number of common shares outstanding has been calculated as follows:

	2023	2022
Issued common shares	22,888,436	22,888,436
Effect of issued common shares	2,512	-
Weighted average number of common shares	22,890,948	22,888,436

No adjustments to loss or the weighted average number of shares for the effects of dilutive potential ordinary shares were necessary. Dilutive potential ordinary shares are financial instruments or contracts that may entitle its holder to ordinary shares, where the conversion, exercise or issuance of the financial instrument or warrant would result in a reduction in earnings per share or an increase in loss per share.

17. CONTRIBUTED SURPLUS

The Company offers a stock option plan for the benefit of certain directors, employees and consultants. The plan is administered by the Board of Directors and the maximum number of shares which may be issued under this plan may not exceed 20% of the number of issued and outstanding shares of the Company. Each stock option entitles its holder to receive one common share upon exercise and all options expire 5 years after issuance. The following table summarizes the changes in outstanding stock options during the years ended December 31, 2022 and December 31, 2023:

	Weighted Average Exercise Price $	Options #
Balances, December 31, 2021	2.52	3,006,626
Issued	2.37	700,000
Forfeited	5.50	(395,000)
Balances, December 31, 2022	2.79	3,311,626
Issued	0.87	590,000
Cancelled	1.32	(25,000)
Forfeited	3.07	(705,000)
Balances, December 31, 2023	2.38	3,171,626

years ended December 31, 2023 and 2022 (in Canadian dollars)

The majority of stock options vest in tranches over three or four years, such that one-third or one-fourth, respectively, of the stock options vest annually. Of the total stock options issued during the year ended December 31, 2023, 300,000 (2022 - 450,000) were issued to key management. Of the total stock options outstanding as of December 31, 2023, 2,371,626 (2022 - 2,521,626) were held by key management. Subsequent to the reporting period, no stock options were granted (2022 - 65,000) at an average price of $NIL (2022 - $1.41), of which NIL (2022 - 25,000) were issued to key management.

The following table summarizes information about stock options outstanding as at December 31, 2022 and December 31, 2023:

December 31, 2022:

Exercise Price $	Options Outstanding #	Weighted Avg Remaining Life #	Options Exercisable #
0.60	575,000	2.6	466,667
1 to 1.99	445,000	4.1	150,000
2 to 2.99	1,370,000	3.2	523,233
3 to 3.99	285,000	4.0	-
4 to 4.99	20,000	3.9	5,000
5 to 5.99	40,000	3.8	10,000
6 to 6.99	10,000	3.6	2,500
7 to 7.99	566,626	3.5	152,907
2.79	3,311,626	3.4	1,310,307

December 31, 2023:

Exercise Price $	Options Outstanding #	Weighted Avg Remaining Life #	Options Exercisable #
0 to 0.99	980,000	3.1	525,000
1 to 1.99	500,000	3.3	215,000
2 to 2.99	980,000	2.3	604,067
3 to 3.99	225,000	3.0	56,250
4 to 4.99	15,000	2.9	7,500
5 to 5.99	25,000	2.8	12,500
6 to 6.99	10,000	2.6	5,000
7 to 7.99	436,626	2.5	235,813
2.38	3,171,626	2.8	1,661,130

years ended December 31, 2023 and 2022 (in Canadian dollars)

The estimated fair value of stock options issued during the period was calculated using the Black-Scholes option pricing model with the following assumptions: i) the time to maturity is 4 years (2022 - 4 years); ii) the risk free rate is between 3.77% and 3.84% (2022 - 1.24% and 3.63%); iii) the dividend yield will be $NIL (2022 - $NIL); and iv) expected volatility is between 73.07% and 84.53% (2022 - 73.07% and 75.52%), which is calculated based on the standard deviation of the Company's stock price since going public. Included in expenses is a share-based compensation expense of $601,560 (2022 - $1,883,929).

Each DSU entitles its holder to receive one common share upon settlement and vests over one year. The following table summarizes the changes in DSUs during the years ended December 31, 2022 and December 31, 2023:

	Weighted Average Price $	DSUs #
Balances, December 31, 2021	-	-
Issued	1.66	135,288
Balances, December 31, 2022	1.66	135,288
Settled	1.66	(15,032)
Balances, December 31, 2023	1.66	120,256

There were 150,000 warrants outstanding as at December 31, 2022, all of which expired during 2023. No warrants were issued during the years ended December 31, 2022 or 2023.

18. RELATED PARTY TRANSACTIONS

Included in trade and other receivables are two (2022 - three) employee loans to key management employees, in the total amount of $75,247 (2022 - $107,948). Of this amount, $50,164 (2022 - $73,720) is expected to be received beyond twelve months after year-end, and is thus classified as long-term. These loans are granted at no interest, with monthly principal repayments through 2027.

Included in research and development, and general and administrative expenses are the following wages and consulting fees paid to key management:

	2023	2022
Salaries, benefits, and consultant fees	$ 1,504,500	$ 1,109,607
Share-based compensation expense	670,856	1,586,566
	$ 2,175,356	$ 2,696,173

Board of directors and executive officers are deemed to be key management.

years ended December 31, 2023 and 2022 (in Canadian dollars)

19. FINANCE (INCOME) COSTS

	2023	2022
Interest income	$ (715,397)	$ (560,282)
Interest expense	235,864	247,925
	$ (479,533)	$ (312,357)

20. INCOME TAXES

The reconciliation of the combined Canadian federal and provincial statutory income tax rate of 26.5% (2022 - 26.5%) to the effective tax rate is as follows:

	2023	2022
Net loss before income taxes	$ (12,013,889)	$ (14,278,368)
Statutory income tax rate	26.50%	26.50%
Expected income tax recovery	(3,183,681)	(3,783,770)
Non-deductible & other expenses	159,294	507,300
Change in tax benefits not recognized	3,024,387	3,276,470
	$ -	$ -

The following table summarizes the components of deferred tax:

	2023	2022
Deferred Tax Assets		
Finance lease liability	$ 400,008	$ 452,180
	400,008	452,180
Deferred Tax Liabilities		
Finance lease liability	(400,008)	(452,180)
Net deferred tax liability	$ -	$ -

years ended December 31, 2023 and 2022 (in Canadian dollars)

Deferred tax assets and liabilities have been offset where they relate to income taxes levied by the same taxation authority and the Company has the legal right and intent to offset.

Deferred taxes are provided as a result of temporary differences that arise due to differences between income tax values and the carrying amount of assets and liabilities. Deferred tax assets have not been recognized in respect of the following deductible temporary differences:

	2023	2022
Operating tax losses carried forward	$ 48,197,270	$ 35,737,200
Operating tax losses carried forward - USA	14,220	8,230
Reserves	4,202,230	4,755,590
Share issuance costs	2,297,380	3,293,450
Scientific research expenditures	2,327,970	2,327,970
Equipment	1,027,470	487,670
Patents	314,890	217,130
Intangible assets and goodwill	314,710	195,100
Tax credits	40,440	40,440
Bank indebtedness	-	20,000
Finance lease liability	238,610	113,540
	$ 58,975,190	$ 47,196,320

The Canadian operating tax loss carry forwards expire as noted in the table below. The U.S. operating tax losses can be carried forward indefinitely. Deferred tax assets have not been recognized in respect of these items because it is not probable that future taxable profit will be available against which the group can utilize the benefits therefrom.

The Company's Canadian operating tax losses expire as follows:

2032	$ 317,140
2033	467,480
2034	971,950
2035	832,470
2036	442,250
2037	968,820
2038	704,240
2039	2,162,230
2040	3,459,710
2041	12,982,950
2042	12,701,800
2043	12,186,230
	$ 48,197,270

years ended December 31, 2023 and 2022 (in Canadian dollars)

21. CHANGE IN NON-CASH WORKING CAPITAL

	2023	2022
Trade and other receivables	$ (771,143)	$ 104,539
Prepaid expenses and deposits	(126,500)	834,796
Inventory	(1,060,663)	(1,675,615)
Trade and other payables	620,552	(1,227,290)
Deferred revenue	2,307,894	(256,300)
Deferred government grants	359,926	-
Contingent liability	(63,184)	-
Income tax recoverable	-	119,763
	$ 1,266,882	$ (2,100,107)

22. SEGMENTED INFORMATION, MAJOR CUSTOMERS, AND REVENUE

The Company mainly operates in one segment, being the development and sale of electrolyzers and balance of plant equipment.

All of the Company's assets are located in Canada. During the year ended December 31, 2023, one customer provided 76% (2022 - 71%) of the Company's revenues.

The Company has three streams of revenue as follows:

	2023	2022
Equipment revenue	$ -	$ 512,600
Service revenue	186,801	208,988
Revenue from development contract	765,107	-
	$ 951,908	$ 721,588

Revenue from development contract is recognized on a percentage of completion basis.

23. FINANCIAL INSTRUMENTS

Risk Management

The Board of Directors has overall responsibility for the establishment and oversight of the Company's risk management framework but has delegated to management the responsibility for monitoring and managing the risks that the Company faces. Financial instruments present a number of specific risks as identified below:

Fair Value

Fair value is defined as the exchange price that would be received to sell an asset or paid to transfer a liability in the principal or most advantageous market for the asset or liability in an orderly transaction between market participants on the measurement date.

years ended December 31, 2023 and 2022 (in Canadian dollars)

Valuation techniques used to measure fair value are required to maximize the use of observable inputs and minimize the use of unobservable inputs. The carrying value of cash and cash equivalents, trade and other receivables, bank indebtedness, and trade and other payables approximate their fair values due to their nature or capacity for prompt liquidation. The carrying values of finance lease liability and long-term debt are based on the contractual interest rates. Using the market interest rates for similar arrangements as at December 31, 2022 would result in the following effects:

	2023	2022
Long-term debt - carrying value	$ 85,389	$ 163,391
Long-term debt - fair value	110,702	182,040
Finance lease liability - carrying value	1,748,073	1,819,890
Finance lease liability - fair value	1,883,936	2,067,625

Valuation techniques used to measure fair value are required to maximize the use of observable inputs and minimize the use of unobservable inputs. Level 2 valuation methods have been used to determine fair values. Level 1 uses quoted prices in active markets for identical assets or liabilities. Level 2 uses inputs other than quoted prices included within level 1 that are observable for the asset or liability, either directly or indirectly.

Credit Risk

Credit risk arises from the potential that debtors will fail to satisfy their obligations as they come due. Credit risk with respect to trade and other receivables is considered low as the balance is largely made up of sales taxes as well as large customers with strong credit. Credit risk with respect to cash and cash equivalents is considered low; the Company held cash and cash equivalents of $10,909,061 at December 31, 2023 (2022 - $22,084,721). The cash and cash equivalents are held with two major Canadian financial institutions which are rated AA1 and A1, based on Moody's ratings. As such, no provision for lifetime expected credit losses has been made.

Market Risk

Market risk refers to the risk that a change in one or more general market conditions will result in losses to the Company. The Company is exposed to interest rate risk and manages this risk through regular monitoring of its financial instruments. The Company is not exposed to other price risk.

(i) Interest rate risk

Interest rate risk arises from the possibility that changes in interest rates will have a negative effect on the value of financial instruments. The Company is exposed to interest rate cash flow risk on its cash and cash equivalents balances, which earn interest at a floating rate.

Exposure to interest rate risk: Next Hydrogen holds financial assets of $75,247 (2022 - $107,948) at a fixed rate and is obligated to financial liabilities of $1,833,462 (2022 - $1,983,281) also at fixed rates; these are accounted for at amortized cost. Given that these are held at fixed rates, they are not subject to interest rate risk, and thus would not impact equity or net loss.

(ii) Foreign currency risk

Currency risk is the risk that the fair value or future cash flows of a financial instrument will fluctuate because of changes in foreign exchange rates. The Company enters into foreign currency purchase and sale transactions resulting in exposure to the financial risk of earnings fluctuations arising from changes in foreign exchange rates and the degree of volatility of these rates. The Company does not use derivative instruments to reduce its exposure to foreign currency risk. However, given that the volume and magnitude of foreign currency transactions is low, the effect this risk has on the Company's earnings is not significant.

Liquidity Risk

Liquidity risk is the risk that the Company will not be able to meet its financial obligations as they become due. The Company manages its liquidity risk by reviewing, on an ongoing basis, its financial requirements for operations and capital expenditures and ensuring financing is available when necessary. As at December 31, 2023, the Company had $10,909,061 (2022 - $22,084,721) in cash and cash equivalents and $1,510,334 (2022 - $715,635) in current trade and other accounts receivable, which were available to settle current trade and other payables, bank indebtedness, current portion of finance lease liability, and current portion of long-term debt of $1,868,066 (2022 - $1,298,747).

years ended December 31, 2023 and 2022 (in Canadian dollars)

Next Hydrogen plans to focus on research and development while building out the necessary infrastructure to commercialize its business and will use its working capital to carry out such initiatives. The Company believes that it has sufficient available liquidity to meet its minimum obligations as they come due to continue as a going concern for a period of at least the next 12 months from December 31, 2023. In making this significant judgment, the Company has prepared a cash flow forecast, with the most significant assumptions in the preparation of such forecast being: (1) the ability to meet the relevant criteria of government grants and revenue contracts for additional funds to be received; and (2) judgment to curtail certain discretionary expenditures, if required, in fiscal 2024. Beyond the next 12 months, the development of new hydrogen technologies and further expansion of Next Hydrogen's business will require substantial additional financing and will be dependent upon its ability to obtain financing through equity or debt, and there can be no assurance that it will be able to obtain adequate financing in the future or on terms acceptable to the Company.

The following table sets out the Company's financial commitments as follows:

	Carrying amount	Total	1 year	2 to 5 years	After 5 years
Trade and other payables	$ 1,714,482	$ 1,714,482	$ 1,714,482	$ -	$ -
Finance lease liability	1,748,073	2,831,188	312,265	1,439,729	1,079,194
Long-term debt	85,389	87,005	64,927	22,078	-
	$3,547,944	$4,632,675	$ 2,091,674	$ 1,461,807	$ 1,079,194

24. CAPITAL MANAGEMENT

The Company's objectives when managing capital are to safeguard its ability to continue as a going concern, to meet its capital expenditures for its continued operations, and to maintain a flexible capital structure which optimizes the cost of capital within a framework of acceptable risk. Management defines capital as the aggregate of its equity, which is comprised of share capital, contributed surplus and retained earnings. The Company manages its capital structure and makes adjustments in light of general economic conditions, the risk characteristics of the underlying assets and the Company's working capital requirements. In order to maintain or adjust its capital structure, the Company may issue new shares or new debt, acquire or dispose of assets, or repay long-term debt. The Board of Directors reviews and approves any material transactions out of the ordinary course of business, including proposals on acquisitions or other major investments or divestitures, as well as annual capital and operating budgets. The Company is not subject to externally imposed capital requirements and there was no change to the Company's approach to capital management during the year.