TANTALUS SYSTEMS HOLDING INC.

Consolidated Financial Statements

For the years ended December 31, 2019, 2018 and 2017
(expressed in United States dollars)

MANAGEMENT'S RESPONSIBILITY

The management of Tantalus Systems Holding Inc. is responsible for the preparation of the accompanying consolidated financial statements and the preparation and presentation of information in the Annual Report. The consolidated financial statements have been prepared in accordance with accounting principles generally accepted under International Financial Reporting Standards and are considered by management to present fairly the financial position and operating results of the Company.

The Company maintains various systems of internal control to provide reasonable assurance that transactions are appropriately authorized and recorded, that assets are safeguarded, and that financial reports are properly maintained to provide accurate reliable financial statements.

The Company's audit committee is comprised entirely of independent directors and is appointed by the Board of Directors annually. The committee meets annually with the Company's management and independent auditors to review the consolidated financial statements and the independent auditors report. The audit committee has approved the consolidated financial statements and reported its findings to the Board of Directors.

The Company's independent auditors, KPMG LLP, have performed an audit of the consolidated financial statements and their report follows.

"Peter Londa"	*"George Reznik"*
Chief Executive Officer	Chief Financial Officer
December 22, 2020	December 22, 2020

KPMG LLP
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Canada
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INDEPENDENT AUDITORS' REPORT

To the Board of Directors of Tantalus Systems Holding Inc.:

Opinion

We have audited the consolidated financial statements of Tantalus Systems Holding Inc. (the "Entity"), which comprise:

- the consolidated statements of financial position as at December 31, 2019 and December 31, 2018;
- the consolidated statements of operations and comprehensive loss for the years ended December 31, 2019, December 31, 2018 and December 31, 2017;
- the consolidated statements of changes in shareholders' equity for the years ended December 31, 2019, December 31, 2018 and December 31, 2017;
- the consolidated statements of cash flows for the years ended December 31, 2019, December 31, 2018 and December 31, 2017; and
- notes to the consolidated financial statements, including a summary of significant accounting policies.

(hereinafter referred to as the "consolidated financial statements").

In our opinion, the accompanying consolidated financial statements present fairly, in all material respects, the consolidated financial position of the Entity as at December 31, 2019 and December 31, 2018, and its consolidated financial performance and its consolidated cash flows for the years ended December 31, 2019, December 31, 2018 and December 31, 2017 in accordance with International Financial Reporting Standards ("IFRS").

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 **"*Auditors' Responsibilities for the Audit of the Consolidated Financial Statements*"** section of our auditors' report.

We are independent of the Entity in accordance with the ethical requirements that are relevant to our audit of the consolidated 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.

Other Information

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

- the information included in Management's Discussion and Analysis

Our opinion on the consolidated 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 consolidated 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 consolidated financial statements or our knowledge obtained in the audit and remain alert for indications that the other information appears to be materially misstated.

The information, other than the consolidated financial statements and the auditors' report thereon, included in the Management's Discussion and Analysis is expected to be made available to us after the date of this auditors' report. If, based on the work we will perform on this other information, we conclude that there is a material misstatement of this other information, we are required to report that fact to those charged with governance.

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

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

In preparing the consolidated 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.

Auditors' Responsibilities for the Audit of the Consolidated Financial Statements

Our objectives are to obtain reasonable assurance about whether the consolidated financial statements as a whole are free from material misstatement, whether due to fraud or error, and to issue an auditors' 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 consolidated 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 consolidated 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 auditors' report to the related disclosures in the consolidated 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 auditors' 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 consolidated financial statements, including the disclosures, and whether the consolidated 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.

- 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 consolidated financial statements. We are responsible for the direction, supervision and performance of the group audit. We remain solely responsible for our audit opinion.

KPMG LLP

Chartered Professional Accountants

Vancouver, Canada
December 22, 2020

TANTALUS SYSTEMS HOLDING INC.

Consolidated Statements of Financial Position

(Expressed in United States dollars)

	Note	December 31, 2019	December 31, 2018
Assets			
Current assets			
Cash		$ 5,368,086	$ 3,640,507
Accounts receivable	*4*	4,819,166	5,749,823
Investment tax credits receivable	*5*	960,728	1,439,769
Inventory	*6*	5,038,119	5,474,661
Prepaid expenses and deposits		563,035	732,429
Total current assets		16,749,134	17,037,189
Property and equipment	*7*	1,477,160	1,086,102
Intangible assets	*8*	759,445	1,147,043
Right of Use assets	*9*	1,152,875	1,562,932
Total assets		$ 20,138,614	$ 20,833,266
Liabilities and Shareholders' Deficit			
Current liabilities			
Accounts payable and accrued liabilities	*10*	$ 9,968,915	$ 12,559,692
Deferred revenue and deposits		3,250,183	919,443
Lease liabilities	*12*	680,595	670,280
Bank loan	*11*	8,196,892	8,044,375
Total current liabilities		22,096,585	22,193,790
Lease Liabilities	*12*	902,381	1,366,117
Total liabilities		22,998,966	23,559,907
Shareholders' deficit			
Share capital	*14*		
Common shares		74,556,543	74,556,543
Other capital reserves		37,436,376	36,978,338
Accumulated other comprehensive income		1,926,003	1,911,832
Deficit		(116,779,274)	(116,173,354)
Total Shareholders' deficit		(2,860,352)	(2,726,641)
Total liabilities and Shareholders' deficit		$ 20,138,614	$ 20,833,266

See accompanying notes to consolidated financial statements.

Commitments and contingencies (*note 18*)
Subsequent events (*note 11 and 26*)

Approved on behalf of the Board:

Director

Director

TANTALUS SYSTEMS HOLDINGS INC.

Consolidated Statements of Operations and Comprehensive Loss

(Expressed in United States dollars)

For the	*Note*	Year ended December 31, 2019	Year ended December 31, 2018	Year ended December 31, 2017
Revenues	***19***	$ 41,588,462	$ 40,412,821	$ 32,331,644
Cost of sales	***6, 14(d), 20***	23,203,522	22,490,993	16,631,742
		18,384,940	17,921,828	15,699,902
Expenses				
Sales and marketing	***14(d)***	6,232,907	6,687,486	6,078,947
Research and development	***5&14(d)***	4,969,106	5,306,754	4,158,892
General and administrative	***14(d)***	5,129,321	5,212,128	4,055,739
Depreciation and amortization	***7, 8, 9***	1,501,493	1,356,029	1,038,615
		17,832,827	18,562,397	15,332,193
Operating income (loss)		552,113	(640,569)	367,709
Other earnings (expenses)				
Foreign exchange gain / (loss)		(226,877)	62,269	(227,106)
Finance expenses	***15***	(921,206)	(891,093)	(893,692)
Change in fair value of FVTPL instruments	***13***	-	-	(8,276,389)
Impairment loss	***25***	-	-	(8,427,100)
		(1,148,083)	(828,824)	(17,824,287)
Loss before income taxes		(595,970)	(1,469,393)	(17,456,578)
Income tax expense	***16***	9,950	-	-
Loss for the year		(605,920)	(1,469,393)	(17,456,578)
Foreign currency translation adjustment		14,171	56,921	(37,374)
Total comprehensive loss for the period		($591,749)	($1,412,472)	($17,493,952)
Loss per share (basic and fully diluted)	***17***	($0.01)	($0.03)	($0.91)
Weighted average number of shares outstanding (basic and fully diluted)	***17***	43,018,997	43,018,997	19,166,341

See accompanying notes to consolidated financial statements.

TANTALUS SYSTEMS HOLDING INC.

Consolidated Statements of Changes in Shareholders' Equity

(Expressed in United States dollars)

		Common Shares		Preferred Shares		Other Capital Reserves	Accumulated Other Comprehensive		Total Shareholders'
	Note	Number	Amount	Number	Amount		Income	Deficit	Equity
Balance, January 1, 2017	***14***	**1,466,030**	**$ 24,314,802**	**1,295,545**	**$ 13,106,054**	**$ 21,032,254**	**$ 1,892,285**	**$ (97,247,383)**	**$ (36,901,988)**
Share-based compensation						44,585			44,585
Restructuring of Tantalus Systems Corp.	***14(b)***	(903,062)	(14,977,711)	1,500,000	113	14,977,016			(582)
Continuation of Tantalus Systems Corp.	***14(c)***	35,192,745	55,310,572	(2,795,545)	(13,106,167)				42,204,405
Loss for the year								(17,456,578)	(17,456,578)
Share issuance on acquisition of Energate Inc.	***14(c), 25***	7,263,284	9,908,880						9,908,880
Foreign Currency Translation adjustment							(37,374)		(37,374)

TANTALUS SYSTEMS HOLDING INC.

Consolidated Statements of Changes in Shareholders’ Equity

(*Expressed in United States dollars)*

Balance, December 31, 2017	***14***	**43,018,997**	**$ 74,556,543**	**-**	**$ -**	**$ 36,053,855**	**$ 1,854,911**	**($114,703,961)**	**$ (2,238,652)**
Share-based compensation						924,483			924,483
Foreign Currency Translation adjustment							56,921		56,921
Loss for the year								(1,469,393)	(1,469,393)
Balance, December 31, 2018	***14***	**43,018,997**	**$ 74,556,543**	**-**	**$ -**	**$ 36,978,338**	**$ 1,911,832**	**($116,173,354)**	**$ (2,726,641)**
Share-based compensation						458,038			458,038
Foreign Currency Translation adjustment							14,171		14,171
Loss for the year								(605,920)	(605,920)
Balance, December 31, 2019		**43,018,997**	**$ 74,556,543**	**-**	**$ -**	**$ 37,436,376**	**$ 1,926,003**	**($116,779,274)**	**$ (2,860,352)**

See accompanying notes to consolidated financial statements

TANTALUS SYSTEMS HOLDINGS INC.

Consolidated Statements of Cash Flows

(*Expressed in United States dollars*)

For the years ended	*Note*	Year ended December 31, 2019	Year ended December 31, 2018	Year ended December 31, 2017
Cash provided by (used in)				
Operating Activities				
Loss for the year		($605,920)	($1,469,393)	($17,456,578)
Items Not Affecting Cash:				
Unrealized foreign exchange loss (gain)		92,584	(27,666)	(59,267)
Depreciation of equipment	*7*	441,270	355,219	428,128
Amortization of intangible assets	*8*	650,166	590,753	290,012
Amortization of right-of-use asset	*9*	410,057	410,057	320,475
Share-Based compensation	*14(d)*	458,038	924,483	44,585
Impairment Loss	*25*	-	-	8,427,100
Finance expenses	*15*	750,876	754,092	661,156
Change in fair value of FVTPL instruments	*13*	-	-	8,276,389
Changes in Non-Cash Operating Working Capital				
Accounts Receivable	*4*	930,657	471,973	(429,823)
Investment tax credits receivable	*5*	479,041	(342,849)	(1,096,920)
Inventories	*6*	436,542	(2,259,735)	(327,940)
Prepaid expenses and deposits		169,393	(355,659)	(85,640)
Accounts payable and accrued liabilities	*10*	(2,590,777)	3,860,586	336,053
Deferred revenue and deposits		2,330,741	(335,267)	797,608
Lease payments for interest	*12*	(155,732)	(197,313)	(184,392)
Interest paid on bank loan	*11*	(595,144)	(556,778)	(476,764)
Net Cash provided by (used in) Operating Activities		3,201,792	1,822,503	(535,818)
Investing Activities				
Purchase of equipment	*7*	(832,328)	(372,436)	(110,777)
Purchase of intangible assets	*8*	(262,568)	(190,368)	(180,344)
Cash acquired on acquisition of Energate	*25*	-	-	168,931
Net Cash used in Investing Activities		(1,094,896)	(562,804)	(122,190)
Financing Activities				
Advances / (repayments) of bank loan	*11*	152,517	(28,875)	573,250
Repayment of lease liabilities	*12*	(601,428)	(531,399)	(367,003)
Net redemption of shares on restructuring	*14*	-	-	(582)
Repayment of debt acquired from Energate	*25*	-	-	(599,472)
Net Cash used in Financing Activities		(448,911)	(560,274)	(393,807)
Increase (decrease) in cash		1,657,985	699,425	(1,051,815)
Effect of foreign exchange on cash		69,594	(111,209)	16,062
Cash, beginning of year		3,640,507	3,052,291	4,088,044
Cash, end of period		**$ 5,368,086**	**$ 3,640,507**	**$ 3,052,291**

See accompanying notes to consolidated financial statements.

1. Reporting Entity

Tantalus Systems Holding Inc. ("TSH") was incorporated pursuant to the provisions of the Canada Business Corporations Act ("CBCA") on July 26, 2017. TSH's business operations are in Canada and in the United States.

The consolidated financial statements of TSH, as at, and for the years ended December 31, 2019, December 31, 2018 and December 31, 2017 comprise the Company and its direct and indirect subsidiaries and the previous entities in existence prior to the common control transactions referenced below (collectively referred to as the "Company").

The Company has two operating subsidiaries: Tantalus Systems Corp. ("TSC") and Energate Inc. ("Energate").

1) TSC was originally incorporated on July 7, 1989. Effective April 1, 2017, the original TSC consummated a series of common control transactions to restructure the share capital of TSC and to amalgamate with a newly incorporated numbered company under the British Columbia Business Corporations Act, with the amalgamated entity continuing operations under the name "Tantalus Systems Corp." (note 14(b) "TSC"). Effective July 15, 2017, TSC consummated a series of common control transactions and became a wholly-owned subsidiary of Tantalus Systems Shareholders Inc. and, thereafter, pursuant to a share purchase agreement effective as of July 26, 2017, TSC became a wholly-owned subsidiary of TSH (note 14(c)). TSC was subsequently continued into the CBCA on August 15, 2017. Throughout the series of common control transactions outlined above and in notes 14(b) and 14(c), TSC (both directly and through its wholly-owned subsidiary) continued to provide smart grid and AMI solutions in support of public power and electric cooperative utilities in the United States, Canada and the Caribbean Basin.

2) Energate was formed through an amalgamation on July 24, 2017 under the *Business Corporations Act* (Ontario) and, thereafter, pursuant to a share purchase agreement effective as of July 26, 2017, Energate became a wholly-owned subsidiary of TSH. Energate was subsequently continued into the CBCA on August 15, 2017. Energate provides interactive energy management applications and products for utilities and their residential customers.

The principles of continuity of interest accounting have been applied to reflect the continuation of interest from TSC and Energate to the Company as a result of the aforementioned common control transactions.

The Company's head and registered office is located in Burnaby, Canada. The Company's direct and indirect operating subsidiaries have offices in Ottawa, Canada; Raleigh, North Carolina, United States and Norwalk, Connecticut, United States.

2. Basis of Presentation

Statement of Compliance

These consolidated financial statements have been prepared in accordance with International Financial Reporting Standards ("IFRS") as issued by the International Accounting Standards Board ("IASB") and interpretations of the International Financial Reporting Interpretations Committee ("IFRIC").

The consolidated financial statements were authorized for issue by the Board of Directors on December 22, 2020.

(Expressed in United States dollars, unless otherwise indicated)

3. Significant Accounting Policies

The accounting policies set out below have been applied consistently to all periods presented in these consolidated financial statements.

(a) Principles of Consolidation

Subsidiaries are entities controlled by the Company. The financial statements of subsidiaries are included in the consolidated financial statements from the date that control commences until the date that control ceases. The financial statements of the subsidiaries are prepared for the same reporting period as the parent company, using consistent accounting policies. Intra-group balances and transactions, and any unrealized income and expenses arising from intra-group transactions, are eliminated in preparing the consolidated financial statements.

The accompanying consolidated financial statements include the accounts of TSH and the following subsidiaries:

Company Entity	Active	Country of Incorporation	Ownership Interest 2019	Ownership Interest 2018
Tantalus Systems Corp.	Yes	Canada	100%	100%
Tantalus Systems Inc.	Yes	U.S.	100%	100%
Energate Inc. (1)	Yes	Canada	100%	100%
Energate, Corp. (1)	No	U.S.	100%	100%

Note (1) – Acquired by the Company on July 26, 2017.

These consolidated financial statements include the accounts of the Company and its wholly-owned subsidiaries.

All intercompany balances and transactions have been eliminated on consolidation. Subsidiaries are those entities which the Company controls by having the power to govern the financial and operating policies of such entities so as to obtain economic benefits from their activities. The existence and effect of voting rights are considered when assessing whether the Company controls another entity.

(b) Going Concern

These consolidated financial statements have been prepared on the basis that the Company is a going concern, which assumes that the Company will continue to realize its assets and discharge its liabilities in the normal course of operations. During the year ended December 31, 2019, the Company incurred a comprehensive loss of $591,749 and as at December 31, 2019 a total shareholders’ deficit of $2,860,352. Management has forecasted its cash flow requirements and believes that it has sufficient cash resources to continue operations for at least the next twelve months from December 31, 2019. The Company’s continuing operations and achievement of its business plan are dependent on generating additional revenues from existing and new customers, extending the maturity date of its bank loan and ultimately on achieving continued profitable operations. The continuity of the Company as a going concern is dependent on its ability to achieve positive cash flow from operations, to obtain debt or equity financing and to achieve and maintain profitable operations. The outbreak of COVID-19 towards the end of 2019 and through 2020 resulted in a change in global economic environment and may lead to further adverse changes in cash flows. These consolidated financial statements do not give effect to any adjustments to the carrying value of recorded assets and liabilities, revenue and expenses, the consolidated statements of financial position classifications used and disclosures that might be necessary should the Company be unable to continue as a going concern. Such adjustments are not reflected in these consolidated financial statements.

(c) Basis of Measurement

These consolidated financial statements have been prepared on the historical cost basis.

(d) Functional and Presentation Currency

These consolidated financial statements are presented in United States dollars. The functional currency of the primary operating entities, Tantalus Systems Holding Inc., Tantalus Systems Corp. and Tantalus Systems Inc., is the U.S. dollar. The functional currency of Energate Inc. is the Canadian dollar. Transactions in foreign currencies are translated to the respective functional currency of the Company entities at exchange rates at the dates of the transactions. Monetary assets and liabilities denominated in foreign currencies at the reporting date are retranslated to the functional currency at the exchange rate at that date. Non-monetary assets and liabilities denominated in foreign currencies at the reporting date are translated to the functional currency at the exchange rates at the dates of the initial transactions.

Assets and liabilities of foreign operations are translated from its functional currency to the presentation currency at the exchange rate at the reporting date. Income and expenses of foreign operations are translated at exchange rates at the dates of the relevant transactions, with average exchange rates used when appropriate. Foreign currency differences arising from translation are recognized in other comprehensive income (loss).

(e) Use of Estimates and Judgments

The preparation of the consolidated financial statements in conformity with IFRS requires management to make judgments, estimates and assumptions that affect the application of accounting policies and the reported amounts of assets, liabilities, revenue and expenses. Judgment, estimates and assumptions are continuously evaluated and are based on historical experience and other factors including expectations of future events that are believed to be reasonable under the circumstances.

Judgments

Judgment is used mainly in determining how a balance or transaction should be recognized in these consolidated financial statements when there is a choice or assessment required by management. The following are critical judgments apart from those involving estimations:

Going concern

Management has applied judgment in the assessment of the Company’s ability to continue as a going concern when preparing its consolidated financial statements. Management prepares the consolidated financial statements on a going concern basis unless management either intends to liquidate the entity or to cease trading, or has no realistic alternative but to do so. In assessing whether the going concern assumption is appropriate, management takes into account all available information about the future, which is at least, but is not limited to, twelve months from the end of the reporting period. Management considers a wide range of factors relating to current and expected profitability and potential sources of replacement financing.

Estimates

Estimates and assumptions are used mainly in determining the measurement of recognized transactions and balances. Actual results may differ from these estimates. Revisions to accounting estimates are recognized in the period in which the estimates are revised and in any future periods affected.

Significant assumptions about the future and other sources of estimation uncertainty that management has made at the consolidated statements of financial position date, that could result in a material adjustment to the carrying amounts of assets and liabilities, in the event that actual results differ from assumptions made, relate to, but are not limited to, the following:

Revenue recognition

The allocation of total transaction price to each performance obligation is based on the relative standalone selling prices of the promised goods or services. When there is observable evidence of stand-alone sales, the Company uses the observable standalone sales to determine the standalone selling price. Where there are no observable standalone sales, the Company estimates the standalone selling price using either the adjusted market assessment approach or the expected cost plus a margin approach.

Investment tax credit ("ITC") receivable

ITCs are accrued when there is reasonable assurance that the credits will be realized. Management's judgment is applied in determining the estimate of the ITC receivable, including assessing whether any provisions should be taken.

Warranty

The Company generally provides a one year to eighteen months warranty on products. The Company accrues for estimated incurred but unidentified warranty issues, based on the Company's best estimate, with reference to past and expected future experience. Warranty costs are also accrued for known warranty issues if a loss is probable and can be reasonably estimated. If there is a change in these estimates, the Company adjusts the accrual accordingly.

Impairment of Goodwill and Intangible Assets

Determining whether an impairment has occurred requires the valuation of the respective cash generating units ("CGU's"), which we estimate using a discounted cash flow method. In applying this methodology, we rely on a number of factors, including actual operating results, future business plans, discount rates, economic projections and market data.

Share-Based Compensation

The Company uses the Black-Scholes option pricing model to determine the fair value of stock options. In estimating the fair value, management is required to make certain assumptions and estimates such as the expected life of options, volatility, risk-free rate, dividend yield and estimated forfeitures at the initial grant date. Changes in assumptions used to estimate fair value could result in different outcomes.

Leases - Incremental Borrowing Rate

The Company cannot readily determine the interest rate implicit in some of its leases, therefore, it uses its incremental borrowing rate ("IBR") to measure lease liabilities. The IBR is the rate of interest that the Company would have to pay to borrow over a similar term, and with a similar security, the funds necessary to obtain an asset of a similar value to the right-of-use asset in a similar economic environment. The IBR requires estimation when no observable rates are available or when they need to be adjusted to reflect the terms and conditions of the lease. The Company estimates the IBR using observable inputs (such as market interest rates) when available and is required to make certain entity-specific estimates (such as interest rate spreads for credit and other risks).

(f) Business Combinations

Acquisitions have been accounted for using the acquisition method required by IFRS 3, Business Combinations. The cost of an acquisition is measured as the aggregate of the consideration transferred, which is measured at acquisition date fair value. The Company uses its best estimates and assumptions to accurately value assets and liabilities assumed at the acquisition date as well as contingent consideration, where applicable, and these estimates are inherently uncertain and subject to refinement. As a result, during the measurement period, which may be up to one year from the acquisition date, the Company records adjustments to the assets acquired and liabilities assumed with a corresponding offset to goodwill. On conclusion of the measurement period or final determination of the values of assets acquired or liabilities assumed, whichever comes first, any subsequent adjustments are recognized in the consolidated statements of operations. Transaction costs the Company incurs in connection with a business combination are expensed as incurred.

Goodwill arising on acquisition is initially measured as the excess of the fair value of the consideration transferred over the fair value of the net identifiable assets acquired and liabilities assumed (subject to certain exemptions to fair value measurement principles such as deferred tax assets or liabilities). If the consideration transferred is lower than the fair value of the net identifiable assets acquired, the difference is recognized immediately in the consolidated statements of operations. After initial recognition, goodwill is measured at cost less any accumulated impairment losses.

(g) Revenues

The Company's revenues are derived through two operating segments, including:

1) The Connected Devices and Infrastructure Segment. This segment is responsible for the sale of TSH's proprietary edge computing modules that are integrated into multiple devices deployed across a utility's distribution grid including meters, sensors, load control switches, street lighting fixtures and distribution automation equipment. Revenue generated from this segment also includes the sale of TSH's proprietary multi-relay load control switches and a suite of communications infrastructure devices that are deployed to deliver an industrial network-of-things / IoT smart grid including base stations, repeaters and collectors; and

2) The Utility Applications and Services Segment. This segment is responsible for the sale of TSH's proprietary mission-critical software applications and a suite or professional services to support utilities. Revenue is generated from this segment through the sale of software licenses, hosting services, professional services (including project management, deployment, installation and engineering support), and post-contract technical support and annual software maintenance services ("PCS").

Revenue from the sale of the Company's connected devices and infrastructure network products and utility software application licenses is recognized at a point in time when control of the hardware products and software is transferred to the customers, primarily upon delivery on a freight on board ("FOB") basis upon shipment or provide access to customer.

Installation services are for the installation of the Company's connected devices and infrastructure network products and utility software applications. Engineering services are primarily consulting, implementation and integration services entered into either on a time & materials or fixed fee basis. Revenue from installation and engineering services is recognized over time, using input method to measure progress towards complete satisfaction of the service.

Revenue from PCS is recognized ratably over the term of the PCS. Any unrecognized revenue is recorded in deferred revenue.

The Company recognizes revenue when it satisfies performance obligations under the terms of its contracts, and control of its products is transferred to its customers in an amount that reflects the considerations the Company expects to receive from its customers in exchange for those products.

The Company determines revenue recognition through the following steps:

- Identification of the contract, or contracts, with a customer;
- Identification of the performance obligations in the contract
- Determination of the transaction price
- Allocation of the transaction price to the performance obligations in the contract; and
- Recognition of revenue when, or as, the Company satisfies a performance obligation.

The Company's contracts often include a number of promised goods or services. Many of the Company's goods and services are distinct from other performance obligations and accounted for as separate performance obligations. When an arrangement involves multiple products and is negotiated as a package solution, the Company accounts for it as a single performance obligation. A good or service is distinct if the customer can benefit from it on its own or together with other components of the Company's products, and the Company's promise to transfer the good or service is separately identifiable from other promises in the contractual arrangement with the customer. In determining the transaction price of contract with a customer, the Company considers the effects of consideration payable by the customer. If a contract has more than one performance obligation, the Company allocates the total transaction price to each performance obligation in an amount based on estimated relative standalone selling prices of the goods and services.

(h) Segment Reporting

An operating segment is a component of the group that engages in business activities from which it may earn revenues and incur expenses, including revenues and expenses that relate to transactions with any of the Company's other components, and for which discrete financial information is available. All operating segment results are regularly reviewed by the Company's chief operating decision maker ("CODM") to make decisions about resources to be allocated to the segment and assess its performance.

The Company currently has two operating segments: (a) Connected Devices and Infrastructure and (b) Utility applications and Services. The performance results for each Segment include items directly attributable to a segment as well as those that can be allocated on a reasonable basis. Unallocated items comprise mainly of operating expenses. (see note 19 – Segmented Information for description of each segment)

(i) Deferred Revenue

The Company enters into annual contractual agreements with its customers for the provision of technical support and software maintenance service pertaining to products and software sold to its customers for which payment is received at the beginning of the service period commencement date and accounted for as deferred revenue which is amortized into revenue as the related period is provided by the Company. The Company also receives customer deposits and advances pertaining to the implementation services provided by the Company which are accounted for as deferred revenue and amortized as revenue as the related service obligation is fulfilled by the Company.

(j) Accounts Receivable and Allowance for Doubtful Accounts

Trade receivables represent amounts due to the Company from its customers. The Company performs ongoing credit evaluations of its customers to assess the probability of trade receivables collection.

The Company records an allowance for doubtful accounts related to trade and other receivables that are considered to be uncollectible. The allowance is based on the Company's knowledge of the financial condition of its customers, the aging of the receivables, the current business environment and historical experience. A change to these factors could impact the estimated allowance and the provision for bad debts.

(k) Inventory

Inventories are measured at the lower of cost and net realizable value. The cost of inventories is based on the first-in first-out principle, and includes expenditures incurred in acquiring the inventories, production or conversion costs and other costs incurred in bringing them to their existing location and condition. Net realizable value is the estimated selling price in the ordinary course of business, less the estimated cost of completion and selling expenses.

(l) Property and Equipment

Property and equipment are recorded initially at cost. Cost includes expenditures that are directly attributable to the acquisition of the asset. An item of property and equipment is derecognized upon disposal or when no future economic benefits are expected to arise from the continued use of the asset. Any gain or loss arising on the disposal or retirement of an item of property, and equipment is determined as the difference between the sales proceeds and the carrying amount of the asset and is recognized in profit or loss within other operating income or expenses. The residual values, useful lives and methods of depreciation of property and equipment are reviewed at each financial year end and adjusted prospectively, if appropriate. Depreciation on property and equipment is provided on a straight-line basis over their estimated useful lives as follows:

Asset	Years
Computer equipment	3.3 years
Furniture and fixtures	5 years
Laboratory and test equipment	5 years

The Company depreciates leasehold improvements on a straight-line basis over the shorter of their useful life or the term of the lease. Assets under construction are capitalized upon completion, under the appropriate category and depreciation starts when first put to use.

(m) Intangible Assets

Intangible assets include externally-acquired computer software and identifiable intangible assets, including customer relationships, intellectual property, and brand name, acquired as part of a business combination. Externally-acquired computer software is initially recorded and measured at acquisition cost. Identifiable intangible assets acquired as part of a business combination are recognized and measured at the fair value of the asset at the time of acquisition.

Subsequent expenditure is capitalized only when it increases the future economic benefits embodied in the specific asset to which it relates. All other expenditures, including expenditure on internally generated goodwill and brands, is expensed as incurred.

An intangible asset is derecognized on disposal, or when no future economic benefits are expected from use or disposal. Gains or losses arising from de-recognition of an intangible asset, measured as the difference between the net disposal proceeds and the carrying amount of the asset, and are recognized in the consolidated statements of operations.

Intangible assets with finite useful lives are amortized on a straight-line basis over their estimated useful lives as follows:

Asset	Years
Computer software	1 year
Customer relationships	4 years
Intellectual property	4 years

(n) Impairment of Long-Lived Assets

The Company evaluates its long-lived assets including property and equipment and intangible assets subject to amortization for impairment whenever events or changes in circumstances indicate that the carrying amount of such assets may not be recoverable. Recoverable amount is determined as the higher of an asset's or cash-generating unit's fair value less costs of disposal and its value in use. If such assets are considered to be impaired, the impairment to be recognized is measured by the amount by which the carrying amount of the assets exceeds the recoverable amount of the assets.

(o) Research and Development

Development activities involve a plan or design for the production of new or substantially improved products and processes. Development expenditures 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. The expenditure capitalized includes the cost of materials, direct labor and overhead costs that are directly attributable to preparing the asset for its intended use. Other development expenditure is recognized in profit or loss as incurred.

Expenditure on research activities, undertaken with the prospect of gaining new scientific or technical knowledge and understanding, is recognized in profit or loss when incurred.

(p) Related Party Transactions

Parties are considered to be related if one party has the ability, directly or indirectly, to control the other party or exercise significant influence over the other party in making financial and operating decisions. Related parties may be individuals or corporate entities. A transaction is considered to be a related party transaction when there is a transfer of resources, services or obligations between related parties.

(q) Leases

The Company accounts for its leases in accordance with IFRS 16 which provides for a single accounting model for lessees. As a lessee, we recognize a right-of-use asset, representing its right to use the underlying asset, and a lease liability, representing its obligation to make lease payments for all leases with a term of more than 12 months, unless the underlying asset is of low value.

A lease is defined as 'a contract, or part of a contract, that conveys the right to use an asset (the underlying asset) for a period of time in exchange for consideration.

Right-of-use assets and lease liabilities

Upon commencement of a lease, the Company records a right-of-use asset and a lease liability. The lease liability has been initially measured at the present value of all fixed lease payments that remain to be paid at the commencement date. The associated right-of-use asset will initially be measured at cost, consisting of:

- the initial amount of the lease liability, adjusted for any lease payments made at or before the commencement date; plus
- any initial direct costs incurred; plus
- an estimate of costs to dismantle and remove the underlying asset or restore the site on which it is located; less
- any lease incentives received.

The right-of-use asset will typically be depreciated on a straight-line basis over the lease term, unless the Company expects to obtain ownership of the leased asset at the end of the lease. The lease term will consist of:

- the non-cancellable period of the lease;
- periods covered by options to extend the lease, where we are reasonably certain to exercise the option; and
- periods covered by options to terminate the lease, where we are reasonably certain not to exercise the option.

The Company records amortization expense over the term associated with its respective lease agreements for which it has accounted for right of use assets. The Company applies the lease of low-value assets recognition exemption to leases of office equipment that are considered of low value. Lease payments on short-term leases (less than one year) are recognized as expenses in the period incurred.

(r) Income Taxes

Income tax expense comprises of current and deferred tax. Current tax and deferred tax are recognized in profit or loss except to the extent that it relates to items recognized directly in equity or in other comprehensive income (loss).

Current tax is the expected tax payable or receivable on the taxable income or loss for the year, using tax rates enacted or substantively enacted at the reporting date, and any adjustment to tax payable in respect of previous years.

Deferred tax is recognized in respect of temporary differences between the carrying amounts of assets and liabilities for financial reporting purposes and the amounts used for taxation purposes. Deferred tax is measured at the tax rates that are expected to be applied to temporary differences when they reverse, based on the laws that have been enacted or substantively enacted by the reporting date. Deferred tax assets and liabilities are offset if there is a legally enforceable right to offset current tax liabilities and assets, and they relate to income taxes levied by the same tax authority on the same taxable entity, or on different tax entities, but they intend to settle current tax liabilities and assets on a net basis or their tax assets and liabilities will be realized simultaneously.

A deferred tax asset is recognized for unused tax losses, tax credits and deductible temporary differences, to the extent that it is probable that future taxable profits will be available against which they can be utilized. Deferred tax assets are reviewed at each reporting date and are reduced to the extent that it is no longer probable that the related tax benefit will be realized.

(s) Earnings per Share

The Company presents basic and diluted earnings per share (“EPS”) data for its common shares. Basic EPS is calculated by dividing the profit or loss attributable to common shareholders of the Company by the weighted average number of common shares outstanding during the period. Diluted EPS is determined by adjusting the profit attributable to common shareholders and the weighted average number of common shares outstanding for the effects of all dilutive potential common shares.

(t) Financial Instruments

The Company’s financial instruments consist of cash, accounts receivable, investment tax credits receivable, accounts payable and accrued liabilities, lease liabilities, and bank loan that the Company has assessed as financial instruments to be measured and classified.

A financial asset is measured at amortized cost if it meets both of the following conditions and is not designated as fair value through the profit or loss:

(A) It is held with a business model whose objective is to hold assets to collect contractual cash flows; and

(B) Its contractual term gives rise on specified dates to cash flows that are solely payments of principal and interest on the principal amount outstanding.

Financial Assets

The Company may have the following non-derivative financial assets: financial assets at fair value through profit or loss, financial assets at fair value through OCI, or financial assets at amortized cost. Management determines the appropriate classification upon initial recognition. All financial assets are recognized initially at fair value plus, in the case of investments not at fair value through profit or losses, directly attributable transaction costs. All of the Company's financial assets are classified as amortized cost under IFRS 9.

Cash

Cash is classified as financial assets measured at amortized cost. Cash in the consolidated statements of financial position comprise cash at banks and subject to an insignificant risk of changes in value.

Accounts Receivable

Accounts receivables comprise trade and other receivables. Trade receivables are classified as financial assets measured at amortized cost. The impairment model is applicable to financial assets measured at amortized cost where any expected credit losses are provided for, irrespective of whether a loss event has occurred as at the reporting date. For accounts receivable excluding taxes receivable, the Company utilized a provision matrix, as permitted under the simplified approach, and has measured the expected credit losses based on lifetime expected credit losses taking into consideration historical credit loss experience and financial factors specific to the debtors and other factors. The carrying amount of trade receivables is reduced for any expected credit losses through the use of an allowance account. Changes in the carrying amount of the allowance account are recognized in the statement of operations. At the point when the Company is satisfied that no recovery of the amount owing is possible, the amount is considered not recoverable and the financial asset is written off. IFRS 9 offers a simplified approach in which the loss allowance for accounts receivable is equal to the life expected credit losses for trade receivables that do not contain a significant financing component. The Company establishes an allowance for doubtful accounts pertaining to potential credit risk associated with its customers.

Financial Liabilities

The Company's financial liabilities are comprised of trade and other payables. Financial liabilities are derecognized when the obligation specified in the contract is discharged, canceled, or expired. Trade and other payables are classified as financial liabilities to be subsequently measured at amortized cost. The Company has accounted for debentures based upon their respective fair values through profit and loss.

Derecognition

The Company derecognizes a financial liability when its contractual obligations are discharged or cancelled or expire.

Offsetting of financial instruments

Financial assets and financial liabilities are offset and the net amount reported in the consolidated statement of financial position if, and only if, there is a currently enforceable legal right to offset the recognized amounts and there is an intention to settle on a net basis, or to realize the assets.

(u) Government Assistance

The Company has access to certain Canadian federal and provincial tax incentives for qualified research and development in Canada. These investment tax credits are recorded as a reduction to the related expenditures in the fiscal year when there is reasonable assurance that such credits will be realized.

(v) Stock-Based Compensation

The Company grants stock options to directors, officers and employees. Each tranche of an award is considered a separate award with its own vesting period and grant date fair value. Fair value of each tranche is measured at the date of grant using the Black-Scholes option pricing model. The grant date fair value of options granted to directors, officers and employees is recognized as share-based payment expense, with a corresponding increase in other capital reserves, over the period that the individual becomes unconditionally entitled to the options. The amount recognized as an expense is adjusted to reflect the number of share options for which the related service is expected to be met, such that the amount ultimately recognized as an expense is based on the number of share options that do meet the related service at the vesting date.

Stock options awarded to the Company's employees and exercisable into common shares of the Company's parent companies are accounted for as employee awards in the consolidated financial statements of the Company. Compensation cost related to the grant of these stock options are recognized as a capital contribution through other capital reserves. Compensation cost and the cost of services received as consideration are measured based on the fair value of the equity instruments.

As the Company is not traded on an exchange, the Company has calculated volatility using a comparable peer group. The Company has applied the simplified method of determining the expected term of the options given limited historical information.

(w) Provisions

Provisions are recognized when the Company has a present obligation (legal or constructive) as a result of a past event, it is probable that the Company will be required to settle the obligation, and a reliable estimate can be made of the amount of the obligation.

The amount recognized as a provision is the best estimate of the consideration required to settle the present obligation at the end of the reporting period, taking into account the risks and uncertainties surrounding the obligation. When a provision is measured using the cash flows estimated to settle the present obligation, it's carrying amount is the present value of those cash flows. When discounting is used, the increase in the provision due to the passage of time is recognized as a finance cost.

(x) Share Capital

Share capital is classified as equity to the extent that it represents a contract that evidences a residual interest in the assets of the Company after deducting all of its liabilities. Incremental costs directly attributable to the issue of shares are recognized as a deduction from equity. Share capital is measured at the fair value of consideration received, except in common control transactions where share capital is measured at the book value of consideration received.

(y) Commitments and Contingencies

Liabilities for loss contingencies arising from claims, assessments, litigation, fines, and penalties and other sources are recorded when the Company has a present obligation as a result of a past result, it is probable that an outflow of resources embodying economic benefits will be required to settle the obligation and a reliable estimate can be made of the obligation. Legal costs incurred in connection with loss contingencies are expensed as incurred.

The Company may be subject to a variety of claims and suits that arise in the ordinary course of business. Although management currently believes that resolving claims against the Company, individually or in aggregate, will not have a material adverse impact on the Company's financial position, results of operations or cash flows, these matters are subject to inherent uncertainties and management's view of these matters may change in the future.

(Expressed in United States dollars, unless otherwise indicated)

(z) New Standards and Amendments Issued but not yet effective

Standards and amendments issued but not yet applicable to the Company's financial statements are listed below. This listing of standards and amendments issued are those that the Company reasonably expects to have an impact on disclosures, financial position or performance when applied at a future date.

Amendments and interpretations	Effective dates
Definition of Business - Amendments to IFRS 3	January 1, 2020
Amendments to References to the Conceptual Framework in IFRS Standards	January 1, 2020
Definition to Material - Amendments to IAS 1 and IAS 8	January 1, 2020

The impact of adopting these standards or amendments is not expected to be material.

4. Accounts Receivable

	December 31, 2019	**December 31, 2018**
Accounts receivable	$4,965,318	$5,804,789
Less: Allowance for doubtful accounts	(146,152)	(54,966)
Net Accounts receivable	**$4,819,166**	**$5,749,823**

The Company did not have any accounts receivable balances from related parties as at December 31, 2019 and 2018 respectively.

The Company entered into an agreement with Export Development Canada ("EDC") whereby EDC agreed to provide 90% insurance coverage for the Company's invoiced sales, up to a maximum of $3,000,000 with certain customers excluded from this coverage.

During the years ended December 31, 2019, December 31, 2018 and December 31, 2017, the Company recorded bad debt expense of $91,186, $45,739 and $9,227, respectively, in general and administrative expense.

Aging analysis of trade receivables is as follows:

	December 31, 2019	**December 31, 2018**
Not past due	$1,226,036	$2,327,896
31-90 days	2,816,995	1,438,000
91-180 days	173,674	1,505,259
Over 180 days	602,461	478,668
Total	**$4,819,166**	**$5,749,823**

(Expressed in United States dollars, unless otherwise indicated)

5. Investment Tax Credits Receivable

	December 31, 2019	December 31, 2018
Investment tax credits receivable	**$960,728**	**$1,439,769**

The Company has access to certain Canadian federal and provincial tax incentives for qualified research and development in Canada. Certain research and development activities and related expenditures performed by the Company qualify for funding reimbursement from the Canadian government subsidy programs inclusive of scientific research and experimental development expenditures (”SR&ED”), the National Research Council of Canada Industrial Research Assistance Program (“IRAP”) and other investment tax credits. These investment tax credits are recorded as a reduction to the related expenditures in the fiscal year when there is reasonable assurance that such credits will be realized.

The impact on the Company’s research and development government assistance through investment tax credits is as follows:

Year ended December 31, 2019	Research and Development, Gross	Investment Tax Credit	Research and Development, Net
Research and Development	$5,951,974	$982,868	$4,969,106

Year ended December 31, 2018	Research and Development, Gross	Investment Tax Credit	Research and Development, Net
Research and Development	$6,294,402	$987,648	$5,306,754

Year ended December 31, 2017	Research and Development, Gross	Investment Tax Credit	Research and Development, Net
Research and Development	$4,854,192	$695,300	$4,158,892

6. Inventory

	December 31, 2019	December 31, 2018
Finished goods	$3,325,763	$3,726,629
Raw materials	1,712,356	1,748,032
Inventory	**$5,038,119**	**$5,474,661**

During the years ended December 31, 2019, December 31, 2018 and December 31, 2017, the Company charged $16,492,199, $16,702,154 and $12,798,594, respectively, of inventory related amounts to cost of sales**.** The Company assesses the valuation of inventory at the end of each period resulting in valuation adjustments accounted for in the respective period based upon management estimates. During the period, inventories were reviewed for obsolescence as part of ongoing operations. Inventory adjustments for obsolescence totaled $328,235, $222,555 and $163,305 during the years ended December 31, 2019, December 31, 2018 and December 31, 2017, respectively, and were recorded in cost of sales.

(Expressed in United States dollars, unless otherwise indicated)

7. Property & Equipment

The following table presents details of movement in the carrying value of equipment by type:

Cost	Computers and Equipment	Furniture and Fixtures	Laboratory and Test Equipment	Leasehold Improvement	Total
Balance, December 31, 2017	$3,158,005	$412,227	$3,788,493	$1,480,535	$8,839,260
Additions	109,112	43,989	138,590	80,745	372,436
Balance, December 31, 2018	$3,267,117	$456,216	$3,927,083	$1,561,280	$9,211,696
Additions	45,976	56,589	678,641	51,122	832,328
Balance, December 31, 2019	$3,313,093	$512,805	$4,605,724	$1,612,402	$10,044,024

Accumulated Depreciation	Computers and Equipment	Furniture and Fixtures	Laboratory and Test Equipment	Leasehold Improvement	Total
Balance, December 31, 2017	$3,031,067	$327,949	$3,655,475	$755,884	$7,770,375
Depreciation	95,875	34,588	46,050	178,706	355,219
Balance, December 31, 2018	$3,126,942	$362,537	$3,701,525	$ 934,590	$8,125,594
Depreciation	60,648	50,341	128,736	201,545	441,270
Balance, December 31, 2019	$3,187,590	$412,878	$3,830,261	$1,136,135	$8,566,864

Net Book Value	Computers and Equipment	Furniture and Fixtures	Laboratory and Test Equipment	Leasehold Improvement	Total
Balance, December 31, 2018	$140,175	$93,679	$225,558	$626,690	$1,086,102
Balance, December 31, 2019	$125,503	$99,927	$775,463	$476,267	$1,477,160

(Expressed in United States dollars, unless otherwise indicated)

8. Intangible assets

Cost	Computer Software	Customer Relations	Intellectual Property	Total
Balance, December 31, 2017	$809,600	$677,509	$962,058	$2,449,167
Additions	190,368			190,368
Balance, December 31, 2018	$999,968	$677,509	$962,058	$2,639,535
Additions	262,568	-	-	262,568
Balance, December 31, 2019	$1,262,536	$677,509	$962,058	$2,902,103

Accumulated Depreciation	Computer Software	Customer Relations	Intellectual Property	Total
Balance, December 31, 2017	$730,889	$70,600	$100,250	$901,739
Depreciation	182,379	169,277	239,097	590,753
Balance, December 31, 2018	$913,268	$239,877	$339,347	$1,492,492
Depreciation	240,175	169,250	240,741	650,166
Balance, December 31, 2019	$1,153,443	$409,127	$580,088	$2,142,658

Net Book Value	Computer Software	Customer Relations	Intellectual Property	Total
Balance, December 31, 2018	$86,700	$437,632	$622,711	$1,147,043
Balance, December 31, 2019	$109,093	$268,382	$381,970	$759,445

(Expressed in United States dollars, unless otherwise indicated)

9. Right of Use Assets

The following table presents details of movement in the carrying value of the right-of-use asset:

	December 31, 2019	December 31, 2018
Beginning Balance	**$ 1,562,932**	**$ 1,972,989**
Amortization for ROU	(410,057)	(410,057)
Ending Balance	**$ 1,152,875**	**$ 1,562,932**

10. Accounts Payables and Accrued Liabilities

	December 31, 2019	December 31, 2018
Trade payables and other payables	$5,958,967	$ 7,461,441
Accrued warranty (a)	699,562	421,501
Employee benefits	1,621,447	1,796,823
Vendor goods and services received	580,113	847,154
Professional fees	376,638	386,912
Other accrued liabilities	732,188	1,645,861
Total	**$9,968,915**	**$12,559,692**

(a) The Company accrues product warranty costs as products are sold to provide for the repair or replacement of defective products. The accrual is based on known warranty issues when a loss is probable and can be reasonably estimated. Accrual for unidentified warranty issues are based on an assessment of historical experience.

11. Bank Loan

The Company entered into a loan agreement on April 12, 2012, and subsequent amendments (together the "Agreement") with Comerica Bank (the "Bank") to fund ongoing working capital requirements. At December 31, 2019, the line of credit facility has a maximum borrowing limit of approximately USD $8,100,000 comprised of two line of credit facilities (which are expressed in different currencies) with respective maximum borrowing limits of USD$7,486,000 and CND$750,000 subject to a borrowing base in the amount equal to the aggregate of a percentage of eligible receivables, accrued investment tax credits, inventory and purchase orders. The facility bears interest at the Bank's prime rate plus 2.00% per annum, payable monthly. The facility had a maturity date of February 26, 2020. The credit facility is secured by financial covenants, a general security agreement, and security over accounts receivable and inventory. As at December 31, 2019, the Company was in compliance with its financial covenants. As at December 31, 2019, the Company had an aggregate balance for its line of credit facilities of USD$8,063,425 (USD$8,044,375 as at December 31, 2018) drawn on its line of credit facility with the Bank.

During 2019, the Company entered into an amendment agreement with the Bank to add a term loan advance credit extension of up to USD$750,000 bearing an interest rate at the bank's prime rate plus 2.5% and with a maturity date of February 26, 2020. As at December 31, 2019, the Company has USD$133,467 drawn on the loan.

The aggregate total bank loan, inclusive of the term loan, payable by the Company is USD$8,196,892 and USD$8,044,375 as at December 31, 2019 and December 31, 2018, respectively.

(Expressed in United States dollars, unless otherwise indicated)

Subsequent to December 31, 2019, the Company entered into an amendment agreement with the Bank which extended the maturity date of the line of credit facility from February 26, 2020 to February 26, 2021. These amounts continue to be presented in the statement of financial position in accordance with the terms of the facility as they existed at the balance sheet date.

12. Lease Liabilities

The Company has leases with respect to its operating premises in Burnaby, British Columbia, Canada ("Burnaby"), Kanata, Ontario, Canada ("Kanata"), Raleigh, North Carolina, United States ("Raleigh") and Norwalk, Connecticut, United States ("Norwalk") in addition to equipment leases. With the exception of short-term and low-value leases, leases are reflected on the balance sheet as a right-of-use asset and a lease liability.

The Company decided to apply recognition exemptions to short-term leases of its equipment leases. Payments made under such equipment leases are expensed on a straight-line basis.

Below is a summary of the activity related to the Company's fixed minimum operating premises and short-term equipment lease liabilities:

	December 31, 2019	December 31, 2018
Maturity Analysis – contractual undiscounted cash flows from minimum lease		
Less than one year	$ 680,595	$ 670,280
One to five years	1,125,528	1,730,589
More than five years	-	16,279
Total undiscounted lease liabilities	**$ 1,806,123**	**$ 2,417,148**

The following is a reconciliation of undiscounted lease liabilities at December 31, 2019 to the lease liabilities recognized at December 31, 2019:

Total undiscounted lease liabilities at December 31, 2019	**$**	**1,806,123**
Discounted using incremental borrowing rate		(223,147)
Total lease liabilities recognized under IFRS 16 at December 31, 2019	**$**	**1,582,976**

(Expressed in United States dollars, unless otherwise indicated)

The following table presents details of movement in the carrying value of the lease liabilities:

	December 31, 2019	December 31, 2018
Beginning Balance	**$ 2,036,397**	**$ 2,660,187**
Add: Interest	155,732	197,313
Less: Payments	(757,160)	(728,712)
Impact of foreign exchange	148,007	(92,391)
Ending Balance	1,582,976	2,036,397
Less: Current portion	(680,595)	(670,280)
Non-current portion	**$ 902,381**	**$ 1,366,117**

Amounts Recognized in Statements of Operations	Year ended December 31, 2019	Year ended December 31, 2018	Year ended December 31, 2017
Finance charge on lease liabilities	$ 155,732	$197,313	$184,392
Variable lease payments expensed	494,967	490,283	458,744
Expenses relating to equipment short term leases	20,841	8,818	4,623
Total amounts recognized in Statements of Operations	**$671,540**	**$696,414**	**$647,759**

The aggregate of the Company's variable lease payments as at December 31, 2019 is as follows and reflect the estimated future payments of the variable operating costs of the long-term operating premises leases in Burnaby, Kanata, Raleigh and Norwalk.

2020	$502,528
2021	502,528
2022	89,362
2023	87,562
2024	87,562
	$1,269,542

13. Convertible Debentures

(a) Class B convertible debentures ("Class B Debentures"):

On March 31, 2017, the principal and accrued interest of all Class B Debentures were converted to 247,578,900 Class B preferred shares of TSC. The total carrying value of the Class B Debentures was recorded as Class B preferred shares of TSC at fair value in the amount of $5,327,266. These Class B preferred shares were included in the TSC share reorganization effective April 1, 2017 (note 14(b)). The Class B Debentures and Class B preferred shares were financial liabilities designated as FVTPL.

(Expressed in United States dollars, unless otherwise indicated)

(b) Class D convertible debentures ("Class D Debentures"):

On March 31, 2017, the principal of all Class D Debentures was converted to 41,084,498 Class D preferred shares of TSC. The total carrying value of the Class D Debentures was recorded as Class D preferred shares of TSC at fair value in the amount of $28,600,750. These Class D preferred shares were included in the TSC share re-organization effective April 1, 2017 (note 14(b)). The Class D Debentures and Class D preferred shares were financial liabilities designated as FVTPL.

14. Share Capital

(a) Authorized share capital:

Unlimited common shares, with no par value:

The holders of common shares are entitled to one vote per share, to receive dividends when declared and, upon liquidation or dissolution, are entitled to receive all assets available for distribution to Shareholders.

TSH does not have any authorized, issued or outstanding preferred shares as of December 31, 2019, nor did it have any preferred shares authorized, issued and outstanding as of December 31, 2018.

On April 1, 2017, TSC consolidated all common and preferred shares on a 10:1 basis. The historical share information has been retrospectively restated to reflect the impact of the consolidation.

TSC had previously authorized, and had issued and outstanding, multiple classes of common and preferred shares, including multiple voting shares, which were consolidated into a separate legal entity that received common shares of TSH in 2017 as described further in Note 14(c).

(b) Restructuring of TSC's share capital:

Effective April 1, 2017, TSC restructured its share capital as follows:

	Common shares		**Multiple Voting Shares**	
	Number	**Amount**	**Number**	**Amount**
Issuance of shares (i)	-	$ -	1,500,000	$113
Repurchase of common shares (ii)	(903,062)	($14,977,711)	-	-
Total (iii)	(903,062)	($14,977,711)	1,500,000	$113

(i) 1,500,000 voting, non-participatory Multiple Voting Shares ("MVS") were issued for $113 to certain existing shareholders of TSC. The MVS are entitled to 10 votes per share.
(ii) 903,062 common shares were repurchased at $0.001 Canadian dollars per share.
(iii) Class B and Class D convertible debentures were converted to Class B and Class D preferred shares in conjunction with the April 1, 2017 capital restructuring, as discussed in Note 13.

(Expressed in United States dollars, unless otherwise indicated)

(c) Continuation of TSC:

Effective July 26, 2017, TSC exchanged all of its issued and outstanding shares for equivalent shares in TSH's parent company and became a wholly-owned subsidiary of TSH. TSH was formed by TSC in conjunction with TSC acquiring Energate.

	Common shares		**Class A Preferred Shares**		**Multiple Voting Shares**	
	Number	**Amount**	**Number**	**Amount**	**Number**	**Amount**
Formation of TSH (i)	35,192,745	$ 55,310,572	(1,295,545)	$ (13,106,054)	(1,500,000)	($113)
Acquisition of Energate (ii)	7,263,284	9,908,880	-	-	-	-
Total	42,456,029	$ 65,219,452	(1,295,545)	$ (13,106,054)	(1,500,000)	($113)

(i) Immediately prior to the formation of TSH in July 2017, TSC had issued and outstanding share capital of 562,968 common shares, 1,295,545 Class A Preferred Shares, 24,757,890 Class B Preferred Shares, 48 Class C Preferred Shares, 4,108,450 Class D Preferred Shares, and 1,500,000 MVS. These were all exchanged into the equivalent share capital of TSH's parent company with TSH issuing 35,755,713 common shares to its parent company and TSC becoming a wholly-owned subsidiary of TSH. As a result, the carrying value of TSC's issued and outstanding preferred shares, including Class A, B and D Preferred Shares as well as MVS shares, of $55,310,572 was transferred to the carrying value of TSH's common shares. The issuance of 35,755,713 common shares was partially offset by a decrease of 562,968 for the net share exchange of TSC common shares to TSH common shares, resulting in a net increase of 35,192,745 common shares.

(ii) TSH issued 7,263,284 common shares with a fair value at the time of issuance of $9,908,880 to acquire Energate (note 25).

(d) Stock option plan

The Company established an incentive stock option plan, approved by the Board of Directors on July 26, 2017, whereby the Company may grant stock options to provide incentives to eligible persons. The stock option plan allows for a maximum of 6,145,571 common shares to be available under the plan.

The stock options are settled by way of issuance of common shares. The exercise price of stock options is determined by a committee of the Board of Directors, or if no committee is appointed, the Board of Directors, and shall not be less than fair market value of a common share. The expiry date of stock options is designated on the date of grant and shall be no later than 10-years from the date of grant. Unless otherwise approved by the Board of Directors, the stock options typically vest over a 4-year term with 25% of the options vesting after 12-months and the remaining 75% of the options vesting monthly in equal amounts over the following 36-months.

(Expressed in United States dollars, unless otherwise indicated)

Stock option activity under the stock option plan of the Company is provided below:

	Number of Options	Weighted Average Exercise Price
Balance at January 1, 2017	-	n/a
Granted during the period	-	n/a
Forfeited/expired during the period	-	n/a
Balance at January 1, 2018	-	
Granted during the period	5,143,842	$0.62
Forfeited/expired during the period	-	n/a
Balance at December 31, 2018	5,143,842	$0.62
Granted during the period	70,000	$0.62
Forfeited/expired during the period	(221,240)	$0.62
Balance at December 31, 2019	**4,992,602**	**$0.62**

During the years ended December 31, 2019 and December 31, 2018, the fair value of options granted was $21,171 and $1,573,569, respectively. The fair value of the options granted was estimated on the date of grant using the Black- Scholes option-pricing model with the following assumptions:

	December 31, 2019	December 31, 2018
Risk free interest rate	1.60%	1.95%
Dividend yield	0%	0%
Expected life (in years)	5.05 years	6.04 years
Forfeiture rate	0%	0%
Volatility	50%	50%

Stock-based compensation expense recognized attributable to options granted under the Company's stock option plan was $458,038, $924,483 and $44,585 during the years ended December 31, 2019, December 31, 2018 and December 31, 2017, respectively. Remaining unrecognized cost of the stock option plan of the Company as at December 31, 2019 and December 31, 2018 was $271,745 and $662,667, respectively.

The Company has allocated the above stock-based compensation expense by respective function of each respective employees and directors as follows:

Year ended December 31, 2019	Cost	Stock-based Compensation	Total
Cost of sales	$23,167,078	$ 36,444	$23,203,522
Sales and marketing	6,148,596	84,311	6,232,907
Research and development	4,848,738	120,368	4,969,106
General and administrative	4,912,406	216,915	5,129,321

(Expressed in United States dollars, unless otherwise indicated)

Year ended December 31, 2018	Cost	Stock-based Compensation	Total
Cost of sales	$22,408,574	$ 82,419	$22,490,993
Sales and marketing	6,500,533	186,953	6,687,486
Research and development	5,145,373	161,381	5,306,754
General and administrative	4,718,398	493,730	5,212,128

Year ended December 31, 2017	Cost	Stock-based Compensation	Total
Cost of sales	$16,631,742	$ -	$16,631,742
Sales and marketing	6,078,947	-	6,078,947
Research and development	4,158,892	-	4,158,892
General and administrative	4,011,154	44,585	4,055,739

(e) Other stock-based compensation

In 2014, TSC, issued 480 Class C preferred shares that was, in substance, a stock-based compensation arrangement. It was determined to be an equity award and estimated grant-date fair value of the award was recognized as an expense in general and administration expense over the 48-month vesting period with this equity instrument being fully vested as at December 31, 2018. These Class C preferred shares were included in the TSC share re-organization in 2017 (note 14(c)). After the share re-organization, the arrangement was determined to continue to be an equity award with the compensation cost recognized as a capital contribution through other capital reserves. During the years ended December 31, 2019, December 31, 2018 and December 31, 2017, $nil, $13,581 and $44,585 was credited to Other Capital Reserves and charged to general and administrative expense.

15. Finance Expenses

Year ended	December 31, 2019	December 31, 2018	December 31, 2017
Accretion of interest on lease liability (*note 12*)	$155,732	$197,313	$184,392
Interest expense on bank loan (*note 11*)	595,144	556,779	476,764
EDC insurance and other finance expenses	170,330	137,001	232,536
Total	**$921,206**	**$891,093**	**$893,692**

(Expressed in United States dollars, unless otherwise indicated)

16. Income Taxes

Income tax expense differs from the amount that would be computed by applying the Canadian federal and provincial statutory income tax rates of 27.00% for the year ended December 31, 2019, 27.00% for the year ended December 31, 2018 and 26.00% for the year ended December 31, 2017 to income before income taxes due to the following:

	December 31, 2019	December 31, 2018	December 31, 2017
Net loss before income taxes	($ 595,970)	($1,469,393)	($17,456,578)
Tax expense at applicable rates	(160,912)	(396,735)	(4,538,710)
Change in unrecognized deferred tax assets	12,774	117,101	(815,063)
Non-deductible expenses and other differences	276,215	388,710	5,282,374
Effect of difference between combined Canadian statutory income rate and those rates applicable to foreign subsidiaries	(70,847)	(95,535)	(29,744)
Other items	(47,280)	(13,541)	101,143
Income tax expense	**$9,950**	**$ -**	**$ -**

The deferred tax assets have not been recognized in these consolidated financial statements, as management does not consider it more likely than not that those assets will be realized in the carry forward period.

The Company's deferred income tax assets not recognized are:

	December 31, 2019	December 31, 2018	December 31, 2017
Deferred tax assets in relation to:			
Equipment	$8,170	$91,636	$124,907
Non-capital losses carried forward	20,075,188	20,233,855	20,292,543
SR&ED expenditures	2,953,064	2,643,176	2,373,713
Reserves and other	861,557	933,324	930,992
Intangible assets	(205,050)	(309,702)	(417,806)
Deferred tax assets not recognized	**$23,692,929**	**$23,592,289**	**$23,304,349**

(Expressed in United States dollars, unless otherwise indicated)

As at December 31, 2019, the Company has non-capital loss carry forwards for Canadian and United States income tax purposes available to reduce taxable income otherwise payable in future years. These losses expire as follows:

Year Loss Expires	Canada	United States	Total
2023	$2,494,179	$ -	$2,494,179
2024	4,180,589	-	4,180,589
2025	8,782,873	-	8,782,873
2026	7,944,080	-	7,944,080
2027	841,043	-	841,043
2028	2,156,493	-	2,156,493
2029	5,889,673	-	5,889,673
2030	14,145,723	-	14,145,723
2031	10,934,817	248,141	11,182,958
2032	4,142,095	-	4,142,095
2033	2,776,540	-	2,776,540
2034	2,824,409	61,304	2,885,713
2035	160,255	-	160,255
2036	1,007,672	1,040,392	2,048,064
2037	1,786,169	316,537	2,102,706
2038	1,671,331	4,621	1,675,952
2039	1,540,355	1,538	1,541,893
Total Losses	**$73,278,296**	**$1,672,533**	**$74,950,829**

As at December 31, 2019, the Company has Canadian non-capital loss carry forwards of $73,278,296 which are available to reduce future taxable income. These non-capital loss carry forwards begin to expire in 2023. The benefit of these non-capital losses have not been recognized as their realization is not reasonably assured.

As at December 31, 2019, the Company has loss carry forwards in other jurisdictions as a result of its foreign operations. For US income tax purposes, there are non-capital loss carry forwards totalling approximately $1,672,533 that may be carried forward indefinitely to reduce taxable income otherwise calculated in future years. These non-capital loss carryforwards begin to expire in 2031. The benefit of these non-capital losses have not been recognized as their realization is not reasonably assured.

As at December 31, 2019, the Company has Undepreciated Capital Cost (“UCC”) amounts of approximately $2,616,003 and approximately $10,477,036 of scientific research and experimental development expenditures (”SR&ED”) that may be carried forward indefinitely to be deducted against future Canadian taxable income. The Company also has federal investment tax credits of approximately $388,048 available to offset future Canadian federal income taxes payable which expire commencing in 2024. The benefits of the UCC, the federal investment tax credits and the SR&ED expenditures have not been recognized as their realization is not reasonably assured.

(Expressed in United States dollars, unless otherwise indicated)

17. Loss per Share

	December 31, 2019	December 31, 2018	December 31, 2017
Comprehensive loss	$591,749	$1,412,472	$17,493,952
Basic weighted average number of shares	43,018,997	43,018,997	19,166,341
Basic and diluted loss per share	$0.01	$0.03	$0.91

Due to the Company having a net loss for the years ended December 31, 2019, December 31, 2018 and December 31, 2017, respectively, there are no dilutive effects of exercisable options.

18. Commitments and Contingencies

(a) In the ordinary course of business, the Company may enter into performance bonds with customers as part of a sales contract. As at December 31, 2019, the Company did not have any performance bonds outstanding and one performance bond for $1,000,000 outstanding as at December 31, 2018.

(b) In the ordinary course of business, the Company enters into purchase order commitments for the delivery of its products pertaining to existing and anticipated customer orders over the next twelve months from its primary vendors.

(c) The Company may be subject to a variety of claims and suits that arise from time to time in the ordinary course of business. Although management currently believes that resolving claims against the Company, individually or in aggregate, will not have a material adverse impact on the Company's financial position, results of operations, or cash flows, these matters are subject to inherent uncertainties and management's view of these matters may change in the future.

(d) The Company along with a shareholder of the Company, as claimants, engaged in an arbitration proceeding against a shareholder of the Company (representing the former shareholders of Energate), as respondent, regarding breaches of representations and other conduct arising from the closing of the acquisition of Energate as such relate to the consideration paid for the acquisition of Energate along with certain advances made to Energate and certain costs incurred (see Subsequent Events note 26(a)).

19. Segmented Information

Operating segments

The Company's revenues are derived through two operating segments, including:

1) *The Connected Devices and Infrastructure Segment*. This segment is responsible for the sale of TSH's proprietary edge computing modules that are integrated into multiple devices deployed across a utility's distribution grid including meters, sensors, load control switches, street lighting fixtures and distribution automation equipment. Revenue generated from this segment also includes the sale of TSH's proprietary multi-relay load control switches and a suite of communications infrastructure devices that are deployed to deliver an industrial network-of-things / IoT smart grid including base stations, repeaters and collectors; and

(Expressed in United States dollars, unless otherwise indicated)

2) *The Utility Applications and Services Segment.* This segment is responsible for the sale of TSH's proprietary mission-critical software applications and a suite or professional services to support utilities. Revenue is generated from this segment through the sale of software licenses, hosting services, professional services (including project management, deployment, installation and engineering support), and post-contract technical support and annual software maintenance services.

Corporate includes all operating expenses of the Company.

Information regarding the operations of each operating segment is included below. Performance is based on revenue less cost of sales.

A breakdown of revenues and cost of sales for each operating segment for the years ended December 31, 2019, December 31, 2018 and December 31, 2017 is as follows:

Year ended December 31, 2019	**Connected Devices and Infrastructure**	**Utility Applications and Services**	**Corporate**	**Total**
Revenue	$28,984,477	$12,603,985	$ -	$41,588,462
Cost of sales	$18,271,543	$4,931,979		$23,203,522
Gross profit	$10,712,934	$7,672,006		$18,384,940
Operating expenses			$17,832,827	$17,832,827
Operating income (loss)	**$10,712,934**	**$7,672,006**	**($17,832,827)**	**$552,113**

Year ended December 31, 2018	**Connected Devices and Infrastructure**	**Utility Applications and Services**	**Corporate**	**Total**
Revenue	$28,548,624	$11,864,197	$ -	$40,412,821
Cost of sales	17,672,173	4,818,820	-	22,490,993
Gross profit	10,876,451	7,045,377	-	17,921,828
Operating expenses	-	-	18,562,397	18,562,397
Operating income (loss)	**$10,876,451**	**$7,045,377**	**($18,562,397)**	**($ 640,569)**

Year ended December 31, 2017	**Connected Devices and Infrastructure**	**Utility Applications and Services**	**Corporate**	**Total**
Revenue	$22,487,108	$9,844,536	$ -	$32,331,644
Cost of sales	13,258,052	3,373,690	-	16,631,742
Gross profit	9,229,056	6,470,846	-	15,699,902
Operating expenses	-	-	15,332,193	15,332,193
Operating income (loss)	**$9,229,056**	**$6,470,846**	**($15,332,193)**	**$ 367,709**

The Company earned revenues attributed to the following geographic regions based on the location of the customer:

	Year ended December 31, 2019	**Year ended December 31, 2018**	**Year ended December 31, 2017**
United States[1]	$41,352,360	$40,030,786	31,974,138
Canada	83,587	233,874	277,390
Others	152,515	148,161	80,116
Total	**41,588,462**	**$40,412,821**	**$32,331,644**

(1) – United States includes revenues attributed to the US Virgin Islands based in the Caribbean basin.

(Expressed in United States dollars, unless otherwise indicated)

20. Expenses by Nature

Total salaries and wages as well as other personnel and contractor related expenses included in Cost of Sales for the years ended December 31, 2019, December 31, 2018 and December 31, 2017 were $5,279,006, $5,017,903 and $3,626,976.

The Company's operating expenses by nature are as follows:

Year ended	December 31, 2019	December 31, 2018	December 31, 2017
Salaries and Benefits	$11,317,538	$11,769,060	$9,905,496
Travel and meals	1,425,382	1,369,478	1,150,593
Depreciation and Amortization	1,501,493	1,356,029	1,038,615
Consulting and agent services	1,162,654	863,265	719,818
Facilities variable lease payments	458,744	490,283	494,967
Stock-based compensation	458,038	924,483	44,585
Marketing programs	384,065	517,628	618,044
Insurance	267,590	230,456	201,864
Office	207,395	238,911	182,251
Personnel programs and hiring costs	110,209	247,167	197,011
Information technology services and maintenance	166,568	186,987	158,585
Other expenses	373,151	368,650	620,364
Total	**$17,832,827**	**$18,562,397**	**$15,332,193**

(Expressed in United States dollars, unless otherwise indicated)

21. Capital Disclosures

TSC was founded in 1989 and raised capital throughout its operating history to fund the development of technology from initial concepts to commercially viable products, to attract and retain employees and to help the Company access its target market. Over its 30-year history, the Company raised multiple rounds of capital in the form of convertible debt and equity instruments giving rise to the shareholders' deficit over the years as the valuation of the business and corresponding values ascribed to previous rounds of financing changed over a 30-year period.

The Company's capital management objective is to ensure that the Company is capitalized in a manner which appropriately supports working capital needs and business expansion. The Company's capital management practices are focused on preserving the quality of its financial position, and to that end, the Company regularly assesses its capital management practices in response to changing economic conditions. The Company's capital is primarily utilized in its ongoing business operations to support working capital requirements, business expansion and other strategic objectives.

The following schedule details the components of the Company's capital.

Deficiency and Liabilities	December 31, 2019	December 31, 2018
Other capital reserves	$37,436,376	$36,978,338
Accumulated other comprehensive income	$1,926,003	$1,911,832
Share capital	$74,556,543	$74,556,543
Deficit	($116,779,274)	($116,173,354)
Bank loan	$8,196,892	$8,044,375

22. Financial instruments

(a) Financial assets and liabilities

Financial instruments are measured at amortized cost or fair value. Fair value represents the estimated amounts at which financial instruments could be exchanged between knowledgeable and willing parties in an arm's length transaction. Determining fair value requires management judgment.

As of December 31, 2019 and December 31, 2018, the carrying values of cash, accounts receivable, investment tax credits receivable, accounts payable and accrued liabilities and bank loan approximate their fair value due to their ability to be promptly liquidated, their short term to maturity, or their use of market rates.

Financial instruments are analyzed using the following hierarchy that reflects the significance of the inputs used in making the measurements:

- Level 1: quoted prices (unadjusted) in active markets for identical assets or liabilities;
- Level 2: inputs other than quoted prices included within Level 1 that are observable for the asset or liability, either directly (i.e., as prices) or indirectly (i.e., derived from prices); and
- Level 3: inputs for the asset or liability that are not based on observable market data (unobservable inputs).

The Company's financial assets and liabilities carried at amortized cost are considered Level 2 instruments, because while observable prices and inputs are available, they are not quoted in an active market. There has not been any transfer between fair value hierarchy levels during the years ended December 31, 2019 and December 31, 2018.

(b) Financial risk management

The Company has exposure to the following risks from its use of financial instruments:

- interest rate risk
- credit risk
- foreign currency exchange rate risk
- liquidity risk

(i) **Interest rate risk**

All of the Company's financial assets and liabilities are non-interest bearing except for cash which generates interest income at market rates. The credit facilities bear interest at a floating rate based on the bank's prime rate and had a balance of $8,196,892 as at December 31, 2019 and $8,044,375 as at December 31, 2018. A potential percentage change in the bank's prime rate of 1.00% will have an impact of $81,969 for the year ended December 31, 2019 and $80,444 for the year ended December 31, 2018 on the Company's annual interest expense pertaining its line of credit facility.

(ii) **Credit risk**

The Company's financial instruments that are exposed to concentrations of credit risk are primarily cash, investment tax credits receivable and accounts receivable. Credit risk pertaining to the Company's accounts receivable is the risk of financial loss if a customer fails to meet its contractual obligations, and arises from the Company's receivables. Accounts receivable primarily consist of trade accounts receivable from utilities companies which have low risk of default. With respect to accounts receivable, the Company engages EDC to perform ongoing credit evaluations of the Company's customers' financial condition and requires letters of credit or other guarantees whenever deemed necessary. The Company applies the IFRS 9 simplified model of recognizing lifetime expected credit losses for all trade receivables. In measuring the expected credit losses, the trade receivables have been assessed on a collective basis as they possess shared credit risk characteristics.

The ageing of the Company's accounts receivable as at December 31, 2019 and December 31, 2018 is provided in Note 4.

(iii) **Foreign currency exchange rate risk**

Although substantially all of the Company's revenues are received in U.S. dollars, the Company incurs operating costs primarily attributable to its services business and has outstanding trade and other payables denominated in Canadian dollars and other foreign currencies. Fluctuations in the exchange rates between these currencies could have a material effect on the business, financial condition and results of operations.

The Company maintains certain financial instruments, inclusive of a portion of its cash, in Canadian dollars which are translated to its U.S. dollar functional currency resulting in an unrealized foreign exchange gain or loss. The Company does not have significant exposure to the impact of foreign exchange fluctuations pertaining to its financial position as at December 31, 2018 and 2019. With all other variables remaining constant, a 10% weakening of the Canadian dollar versus the U.S. dollar would have had a $141,032 impact on net loss for the year ended December 31, 2019 and $183,739 for the year ended December 31, 2018.

The consolidated statements of financial position include the following amounts denominated in Canadian dollars at their equivalent US dollar amounts:

	As at December 31, 2019	**As at December 31, 2018**
Cash	$298,512	$449,061
Accounts receivable	150,174	143,196
Accounts payable	(521,301)	(1,034,459)
Accrued liabilities	(587,709)	(670,084)
Bank loan	(750,000)	(750,000)
Total	**($1,410,324)**	**($1,862,286)**

At present, the Company does not have any formal policy for hedging against foreign currency exchange rate risk.

(iv) **Liquidity risk**

Liquidity risk is the risk that the Company will encounter difficulty in meeting the obligations associated with its financial liabilities that are settled by delivering cash or another financial asset. The Company constantly monitors its operations and cash flows to ensure that current and future obligations will be met when due.

The maturities of the Company's financial liabilities are as follows:

	As at December 31, 2019
Less than 90 days:	
Accounts payable and accrued liabilities	$9,968,915
Bank loan (note 11)	$8,196,892

(Expressed in United States dollars, unless otherwise indicated)

23. Related Party Transactions

Transactions between the Company and its subsidiaries, which are related parties of the Company, have been eliminated on consolidation and not disclosed in this note. The following table discloses the compensation amount of the Board of Directors and key management personnel in the ordinary course of their employment recognized as an expense during the reporting periods. Key management personnel have authority and responsibility for overseeing, planning, directing and controlling the activities of the Company and consist of the Company's executive officers. The remuneration of key management for the years ended December 31, 2019, December 31, 2018 and December 31, 2017 is as follows:

	Year ended December 31, 2019	Year ended December 31, 2018	Year ended December 31, 2017
Short-term employee benefits	$1,316,192	$1,293,663	$1,014,710
Share-based compensation	211,995	422,780	44,585
Total	**$1,528,187**	**$1,716,443**	**$1,059,295**

Compensation of the key management personnel includes salaries and non-cash benefits.

24. Supplemental Cash Flow Information

The following are non-cash investing and financing activities that occurred during the years ended December 31:

Years ended	December 31, 2019	December 31, 2018	December 31, 2017
Lease liabilities entered into and recorded as right-to-use assets	$ -	$ -	$721,162
Acquisition of Energate	$ -	$ -	$9,908,880
Restructuring of Tantalus Systems Corp.			
Conversion of Class B and D debentures at fair value to preferred shares	$ -	$ -	$33,928,016
Redemption of preferred shares	$ -	$ -	($14,977,711)
Continuation of Tantalus Systems Corp.			
Exchange of Class B and Class D preferred shares through issuance of common shares	$ -	$ -	$42,204,405
Exchange of Classes A preferred shares through issuance of common shares	$ -	$ -	$13,106,167

(Expressed in United States dollars, unless otherwise indicated)

25. Business combination

On July 26, 2017, the Company acquired 100 common shares of Energate, representing all issued and outstanding shares of Energate, in exchange for consideration payable by issuing 7,263,284 common shares of Tantalus Systems Holding Inc. Energate is a company that provides interactive load management solutions and products for utilities and residential customers. Acquisition-related costs were expensed as incurred.

The transaction has been accounted for as a business combination using the fair value at the time of the acquisition of $9,908,880 (Canadian dollars $12,397,290). The fair value of consideration paid has been allocated as follows:

Identifiable assets acquired:		
Cash	$	168,931
Accounts receivable		1,068,186
Inventory		194,430
Prepaid expenses		27,847
Property, plant and equipment		52,184
Intangible assets		8,538,019
		10,049,597
Liabilities assumed:		
Accounts payable and accrued liabilities		1,057,104
Bank indebtedness		12,789
Debt		599,472
		1,669,365
Net identifiable assets acquired		8,380,232
Goodwill		1,528,648
Consideration paid	$	9,908,880

The results of operations of Energate have been included in the consolidated financial statements of the Company from the effective date of acquisition. Subsequent to the acquisition, management of the Company determined that actual and projected revenue and financial results of Energate were significantly lower than expected. This has resulted in impairment loss on the following balances being recognized in these consolidated financial statements for the year ended December 31, 2017.

Goodwill impairment	$	1,528,648
Intangible assets impairment		6,898,452
Total impairment	$	8,427,100

See Note 18(d) Commitments and Contingencies and Note 26(a) Subsequent Events pertaining to the Company's acquisition of Energate.

26. Subsequent Events

(a) The Company engaged in an arbitration proceeding against the former shareholders of Energate regarding breaches of representations and other conduct arising from the acquisition of Energate. The arbitrator delivered an award in the amount of $3,000,000 (in Canadian dollars) to the claimants to be applied by cancelling common shares of the Company held by the respondent having a value equal to such amount in accordance with the terms of the share purchase agreement pursuant to which the Company acquired Energate. The parties entered into two settlement agreements on July 8, 2020 and September 4, 2020 resulting in the cancellation of 2,258,309 outstanding shares for a litigation award in the amount of $3,000,000 (in Canadian dollars) and cost reimbursement for litigation costs of CDN$861,709 incurred by the Company. The Company incurred total legal costs of $724,401 pertaining to this litigation during the year ended December 31, 2019 and $916,562 during the year ended December 31, 2018). The Company is pursuing eventual collection of awarded costs.

(b) The Company continues to actively monitor the current international and domestic impacts of and responses to COVID-19 and its related risks, and continues to prepare accordingly. As the situation is dynamic and the ultimate duration and magnitude of the impact on the economy is not known, an estimate of the financial effect on the Company is not practicable at this time.

The COVID-19 pandemic has developed rapidly in 2020, with a significant number of cases. Measures taken by various governments to contain the virus have affected economic activity and the group's business in various ways inclusive of a reduction in the supply of goods and materials from the Company's contract manufacturer supplier which has affected our ability to continue the production of the Company's products as well as the reduction of economic activity/requirement to close our office facilities with the requirement for the large majority of our employees to work from home which has resulted in a significant reduction in sales/productivity during the year ending December 31, 2020.

Governments in the countries in which we operate have also announced the implementation of government assistance measures which might mitigate some of the impact of the COVID-19 pandemic on our results and liquidity. To the extent appropriate, we have applied for and received such government assistance in the countries in which we operate. The details of all of the arrangements that might be available to us and the period throughout which they will remain available are continuing to evolve and remain subject to uncertainty. We are continuing to assess the implications for our business when these arrangements are no longer available. Depending on the duration of the COVID-19 crisis and continued negative impact on economic activity, the group might experience further negative results, and liquidity restraints and incur additional impairments on its assets in future. The exact impact on our existing and future activities cannot be predicted.

(c) On September 8, 2020, the Company and RiseTech Capital Corp.("RiseTech"), a TSX Venture Exchange-listed capital pool company, entered into a non-binding letter of intent, pursuant to which the parties agreed to complete a plan of arrangement, merger, amalgamation, share exchange and/or other similar transaction. On November 19, 2020, the Company entered into a definitive agreement with RiseTech to complete a merger of the two entities along with the closing of a concurrent financing of approximately CND $8.8 million through a Subscription Receipt.