

## ZTEST Electronics Inc.

Management's Discussion and Analysis

For The Year Ended June 30, 2018

(Prepared as at October 29, 2018)

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### General

The following management's discussion and analysis ("MD&A") of the financial condition and results of operations of ZTEST Electronics Inc. ("ZTEST" or the "Company") constitutes management's review of the factors that affected the Company's consolidated financial and operating performance for the year ended June 30, 2018. The MD&A was prepared as of October 29, 2018 and was approved by the Board of Directors on October 29, 2018. It should be read in conjunction with the consolidated financial statements of the Company for the year ended June 30, 2018, including the notes thereto. Unless otherwise stated, all amounts discussed herein are denominated in Canadian dollars.

Additional information about the Company can be found at [www.sedar.com](http://www.sedar.com).

### The Company

ZTEST is located at 523 McNicoll Avenue, Toronto, Ontario. Through its wholly-owned subsidiary, Permotech Electronics Corporation ("PEC"), the Company operates a single business segment designing, developing, and assembling printed circuit boards and other electronic equipment.

The Company held its annual general meeting on December 19, 2017 resulting in the election, or re-election, of its Board members. The inaugural meeting of this Board was held immediately following the annual general meeting, during which one Director resigned, a new Director was appointed to fill the vacancy, the Officers of the Company were appointed, and the subcommittees noted below were formed.

Effective June 15, 2018 Mr. Wojciech Drzazga resigned his positions as Director, Chairman, and Chief Executive Officer of the Company. Mr. Steve Smith was appointed Chairman on June 15, 2018 and was appointed as President and Chief Executive Officer on July 4, 2018. As at the date of this document the vacancy created on the Board, as a result of Mr. Drzazga's resignation, has not been filled.

<u>Name</u>	<u>Position(s)</u>
Steve Smith <sup>(2,7)</sup>	Chairman, President & Chief Executive Officer
William J. Brown <sup>(1*,3,6)</sup>	Director (Independent)
K. Michael Guerreiro <sup>(1,2,3*,6)</sup>	Director (Independent)
Brendan Purdy <sup>(1,2,4)</sup>	Director (Independent)
Wojciech Drzazga <sup>(5,6)</sup>	Director and Officer of subsidiary
John Perreault <sup>(4)</sup>	Officer of subsidiary
Michael D. Kindy, CPA, CA	VP Finance & Chief Financial Officer
William R. Johnstone, LLB	Corporate Secretary

\* Acts as Committee Chair

(1) Member of the Audit Committee

(2) Member of the Strategic Planning Committee

(3) Member of the Compensation Committee

(4) Mr. John Perreault was re-elected as a Director of the Company at the December 19, 2017 annual general meeting but resigned his positions as a Director and Officer of the Company at the start of the Board meeting that immediately followed. The Board accepted Mr. Perreault's resignation and appointed Mr. Brendan Purdy to fill the vacancy. Mr. Purdy had been presented to the Company as a potential nominee for the Board however his nomination had not been made in accordance with the Company's Advance Notice Provisions so he was ineligible to be elected at the meeting. Mr. Perreault continues in his role as the President and Chief Operating Officer of the Company's subsidiary, Permotech Electronics Corporation.

(5) Mr. Wojciech Drzazga resigned his positions as Director, Chairman, and Chief Executive Officer effective June 15, 2018. Mr. Drzazga continues in his roles as a Chairman and Chief Executive Officer of the Company's subsidiary, Permotech Electronics Corporation.

(6) Serves as a Director of the Company's subsidiary, Permotech Electronics Corporation.

(7) Mr. Steve Smith was appointed as Chairman effective June 15, 2018, and as President and Chief Executive Officer on July 4, 2018. Prior to the July 4, 2018 appointment Mr. Smith had been an independent Director and a member of the Audit Committee.

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### **Corporate Performance**

At the December 19, 2018 meeting of the Company's Board of Directors, the Strategic Planning Committee was requested to investigate and then advise the Board with respect to the Company's mid-range and long-range strategic plans as well as its investment opportunities. In accordance with the Committee's recommendations, the Board approved the completion of a private placement financing for the specific purpose of increasing the Company's investment in Conversance Inc. ("Conversance").

Conversance is a Waterloo based private company focused on developing and marketing proprietary Artificial Intelligence supported distributed ledger technologies. In December 2016, the Company had acquired 155,000 shares of Conversance, a 15.05% interest, plus an option to increase its holdings to 19.91% by acquiring an additional 62,500 shares. In January 2018 the Company exercised this option by paying \$140,000 and issuing 275,000 common shares valued at \$189,200. Then, on February 28, 2018, the Company paid \$500,000 to acquire another 78,750 shares and increased its holdings to 25.29%.

The February 2018 investment was funded, primarily, by the private placement transaction through which the Company generated gross proceeds of \$531,250. In conjunction with the February investment, the Company also held options permitting it to increase its holdings in Conversance to a maximum of 34.99% however these options were allowed to lapse. The Company continues to have the right to nominate one Director, out of a total of three, to the Conversance Board of Directors and to participate in future financings of Conversance.

The combination of the Company's 25.29% interest in Conversance, and the associated rights the Company holds, provides the Company with, what is defined under IFRS to be, significant influence relative to Conversance. IFRS requires the Company to recognize its proportionate share of the investee's results of operations subsequent to the date that significant influence was acquired and that resulted in recognition of a loss of \$27,451 to June 30, 2018. Conversance remains in the development phase and has not yet commenced commercial operations.

In addition to the loss arising from the investment in Conversance, the Company has also recognized losses in the amount of \$856,305 from its own operations. These losses include the \$591,996 value attributed to stock options granted during the year. On January 12, 2018 the Company granted 600,000 stock options to Officers and Directors and 440,000 to consultants. In accordance with Company policy, these options were valued using the Black-Scholes pricing model, which is the most commonly used theoretical pricing model, but can produce results that may not always seem entirely logical. The 440,000 consultant options had an exercise price of \$0.95, terms ranging from thirteen to twenty-four months, staged vesting over a twelve-month period, and were attributed a value of \$98,980 even though all 440,000 options were surrendered back to the Company prior to their initial vesting date. The 600,000 stock options granted to Directors and Officers have an exercise price of \$0.95, a 5-year term, vested immediately, and were attributed a value of \$493,017. There is no doubt that stock options have value, and are granted with the expectation that they will confer some benefit upon the recipients, but there is no assurance that benefit, if any, will correlate with the theoretical value determined under the Black-Scholes pricing model.

Since \$591,996 is attributable to the stock options then \$264,309 in 2018 losses are attributable to other operating challenges. The two most significant challenges were an inconsistent market and a significant legislated increase in labour costs. Minimum wage in the Province of Ontario rose by almost 23% on January 1, 2018, forcing employers in Ontario to adjust payrates for the majority of their employees. Adding to the burden, this legislation was passed only 39 days prior to becoming effective. The impact upon manufacturing labour costs should be evident however there was also an impact on other costs as affected employers devised means to pass their incremental costs along to their customers. Unfortunately, this dissemination of incremental costs is not as easy for custom manufacturers, with reasonably long sales cycles, operating in a competitive marketplace. Competition made it more challenging to get ahead of the cost increase while the long sales cycle prolonged the period required to react once the legislation was passed. As with all new challenges, a new equilibrium emerges, but not before having a negative impact upon margins and profitability.

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### Corporate Performance - continued

The timing of the wage increase was also somewhat unfortunate as it occurred during a period for which revenues are seasonally low, which is synonymous with competition being seasonally high. The second quarter of the fiscal year, which terminates at the end of the calendar year, typically produces revenues that are below the quarterly average for the year. This was again true in the 2018 fiscal year but unfortunately it was not the lowest revenue producing quarter of the year. That distinction came during the third quarter, for which no individual month was very good, but the final month was particularly weak. This was a function of reduced market activity, as customers adapted to the new equilibrium, combined with highly aggressive competition seemingly taking on orders at prices that provided little or no margin. These conditions did not persist, as fourth quarter revenues returned to more traditional levels, but again, not before the Company endured a negative impact upon margins and profitability.

Given the seasonal downturn during the second quarter, and the untypical results for the third quarter, it may be surprising to realize that revenues for the 2018 year were less than \$70,000 below 2017 levels, having declined only 1.8%. This was only made possible by good revenue results in the first and last fiscal quarters of 2018. Expectations are that revenues will remain strong at least through the first quarter of 2019.

As may be anticipated, a year which provides a revenue decline of 1.8%, and operating losses, also produces a negative impact on cash resources and liquidity. During the 2018 fiscal year the Company's current financial assets, being cash and accounts receivable, declined by \$351,339 while current financial liabilities declined by \$39,297. These results were driven by operations that used net cash of \$186,121, and working capital changes that used another \$87,937. At June 30, 2018 the Company had a small cash deficiency and had utilized \$110,000, or 44%, of its revolving line of credit.

The following data may provide some additional insights relative to the Company's operating performance and financial position:

	For the fiscal years ended:		
	June 2018	June 2017	June 2016
Total Revenues	3,686,132	3,754,883	4,211,885
Net loss from operations	(856,314)	(203,576)	(42,595)
Per share - basic	(0.046)	(0.014)	(0.004)
Net loss for the year	(883,756)	(497,881)	(42,553)
Per share - basic	(0.047)	(0.035)	(0.004)
Total assets	2,226,121	1,783,512	1,708,698
Total long-term financial liabilities	3,291	42,784	82,276
Total liabilities	783,898	862,688	661,368

	For the three month periods ended:				
	June 2018	Mar. 2018	Dec. 2017	Sept. 2017	June 2017
Total Revenues	1,010,852	729,743	800,502	1,145,035	1,158,812
Net income (loss) from operations	(12,076)	(741,021)	(148,014)	44,797	60,350
Per share - basic	(0.001)	(0.038)	(0.008)	0.003	0.004
Net income (loss) for the period	(29,583)	(750,957)	(148,013)	44,797	(234,114)
Per share - basic	(0.001)	(0.038)	(0.008)	0.003	(0.014)
Total assets	2,226,121	2,224,813	1,399,349	1,662,504	1,783,512
Total long-term financial liabilities	3,291	13,164	23,037	32,911	42,784
Total liabilities	783,898	753,008	544,242	686,883	862,688

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**Corporate Performance - continued**

	For the three month periods ended:				
	Mar. 2017	Dec. 2016	Sept. 2016	June 2016	Mar. 2016
Total Revenues	1,099,568	668,803	827,700	1,013,950	1,094,232
Net income (loss) from operations	33,568	(180,899)	(116,595)	(81,112)	(15,550)
Per share - basic	0.002	(0.015)	(0.011)	(0.008)	(0.001)
Net income (loss) for the period	33,569	(180,788)	(116,548)	(81,112)	(15,550)
Per share - basic	0.002	(0.015)	(0.011)	(0.008)	(0.001)
Total assets	1,954,654	1,648,537	1,535,979	1,708,698	1,843,819
Total long-term financial liabilities	52,656	62,530	72,403	82,276	92,149
Total liabilities	819,716	550,418	585,197	661,368	715,377

There were no cash dividends paid or accrued during any of the periods noted above.

**Results of Operations**

As acknowledged previously, revenues for the 2018 year were 1.8% lower than 2017 revenues, however cost of product sales declined 2.8% allowing the gross margin to increase by a very modest \$4,536. The gross margin for 2018 was 30.4% of total revenues as compared to 29.8% in 2017. In both the 2018 and 2017 fiscal years the gross margin percentage in the final quarter exceeded the annual average. In the final quarter of 2018 the margin was 33.1% of revenues as compared to 32.0% in Q4 of 2017.

There was an alteration in the market following the 2014 fiscal year, with a shift to shorter production runs, and more aggressive competition, serving to maintained pressure on gross margins. The 2018 annual percentage of 30.4% is consistent with the average margin realized from 2015 through 2018. There is always some variation in gross margin percentage from period to period but the 2018 return to the average of recent years, and the results for the final quarter of 2018, are considered encouraging in light of the recent challenges.

A better understanding of the margins achieved can be obtained through review of the elements of the cost of product sales. The different elements of cost of product sales, and the changes realized, are as follows:

Years ended	June 18	June 17	Change
Raw materials and supplies consumed	\$ 1,672,413	\$ 1,712,277	\$ (39,864)
Labour costs incurred	730,614	688,893	41,721
Depreciation	72,980	87,767	(14,787)
Repairs and maintenance	17,594	52,296	(34,702)
Other costs	89,271	90,269	(998)
Net change in finished goods and work in process	(18,725)	5,932	(24,657)
<b>Total cost of product sales</b>	<b>\$ 2,564,147</b>	<b>\$ 2,637,434</b>	<b>\$ (73,287)</b>

Three month periods ended	June 18	June 17	Change
Raw materials and supplies consumed	\$ 417,680	\$ 515,149	\$ (97,469)
Labour costs incurred	195,204	189,027	6,177
Depreciation	18,334	21,949	(3,615)
Repairs and maintenance	7,681	14,247	(6,566)
Other costs	23,155	29,058	(5,903)
Net change in finished goods and work in process	14,346	18,727	(4,381)
<b>Total cost of product sales</b>	<b>\$ 676,400</b>	<b>\$ 788,157</b>	<b>\$ (111,757)</b>

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### Results of Operations - continued

The cost of materials consumed has remained quite comparable between the 2017 and 2018 fiscal years. The 2018 costs are 2.3% lower overall, and equated to 45.4% of total revenues as opposed to 45.6% in 2017. This is also consistent with 2016 results when material costs were equal to 45.5% of revenues for the year. Given that these costs are incurred at customers' discretion, who also have the option of providing their own materials, a variance of this small a magnitude is not considered significant. As has been the norm, this same consistency does not appear when considering shorter periods, such as a single fiscal quarter. Costs for the final quarter of 2018 were 18.9% lower than they had been during the fourth quarter of 2017, while revenues for the same periods declined by 12.8%. Management consistently promotes the benefits customers may derive from our provision of the necessary materials, however the availability of choice frequently leads to cost variances, particularly over shorter time periods.

As noted previously, there was significant upward pressure on the cost of labour through the final six months of the 2018 fiscal year. In spite of this pressure, the Company's labour costs incurred were only 6.0% higher for the 2018 fiscal year and only 3.3% higher in the final quarter in comparison to the same periods one year earlier. Labour management has always been a significant priority for the Company but recent legislative changes have served to further increase its significance. The Company will continue to manage labour to match, as closely as possible, labour supply with current and expected future demand.

The total labour costs included in cost of product sales combine the labour costs incurred with the net change in finished goods and work in process, a measure of the change in labour costs included in inventory. This is where the upward pressure on costs becomes more apparent as fourth quarter costs rose by \$1,796 even though revenues for the 2018 period were 12.8% lower. The disparity for the annual periods is less dramatic as costs rose by 2.5% as compared to a 1.8% revenue decline. Changes in labour costs are rarely, if ever, perfectly correlated with changes in revenues however it is most common for both to either increase or decrease in a given period.

Depreciation is a function of time and the carrying value of the manufacturing equipment in use. No significant additions have been necessary since the end of the 2014 fiscal year so depreciation costs continued to decline. Management continually evaluates equipment needs and monitors the equipment market for opportunities, but there are no major equipment additions currently being investigated.

Repairs and maintenance costs were considerably lower for the three-month and twelve-month periods ended June 30, 2018 than they were at June 30, 2017. The Company conducts maintenance continually while repairs are conducted on an as-needed basis, or on a preventative basis when time permits. No significant repairs or maintenance were deferred during the recently concluded quarter.

Other costs include stencils and tooling, packaging, and freight costs net of amounts recovered. Each of these costs is incurred on an as-needed basis without any specific correlation with revenues. These costs are closely monitored and are within management's expectations.

Selling, general and administrative expenses for the periods ended June 30 were as follows:

Years ended	June 18	June 17	Change
Employee and consultant compensation	\$ 896,089	\$ 852,682	\$ 43,407
Occupancy costs	263,446	262,472	974
Professional fees	99,998	56,074	43,924
Insurance	30,945	29,643	1,302
Shareholder services	26,121	22,117	4,004
Other costs	59,352	55,224	4,128
<b>Total selling, general and administrative</b>	<b>\$ 1,375,951</b>	<b>\$ 1,278,212</b>	<b>\$ 97,739</b>

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**Results of Operations - continued**

Three month periods ended	June 18	June 17	Change
Employee and consultant compensation	\$ 217,438	\$ 223,723	\$ (6,285)
Occupancy costs	65,915	63,910	2,005
Professional fees	26,055	6,037	20,018
Insurance	7,929	7,350	579
Shareholder services	3,222	2,718	504
Other costs	13,919	10,778	3,141
<b>Total selling, general and administrative</b>	<b>\$ 334,478</b>	<b>\$ 314,516</b>	<b>\$ 19,962</b>

Employee and consultant compensation costs have risen in 2018, as compared to 2017, as a result of increases in Directors' fees and consulting fees. In December 2017 the Company added a fourth independent Director to its Board and in January 2018 they also began paying fees to the independent Directors of the subsidiary company. Consulting fees have increased as a consequence of incremental services provided earlier in the year by the Chief Financial Officer and having retained a consultant to provide business development services.

Occupancy costs consist primarily of rent, common area costs, and utility charges for the Company's operating facility. Basic rental charges increased by 1.0% in January 2018 (2.7% January 2017). The remaining variance is due to fluctuations in utility rates and usage, property tax rates, and other common area costs associated with the facility and its lease. The Company's operating facility lease runs through March 2021 and occupancy costs are expected to remain generally comparable throughout that lease term.

Professional fees are comprised of legal services and a prorated estimate of the cost of the ensuing audit of the annual financial statements. Audit costs have remained consistent from 2017 to 2018. Legal fees however have risen in both the recent fiscal quarter and on a year to date basis as a consequence of additional corporate governance services, fees related to the annual general meeting held December 17, 2017, and services ancillary to the private placement and investments in Conversance Inc. Legal fees related specifically to the private placement and the investments were accounted for as costs of those transactions.

Shareholder services, which include all regulatory costs and costs associated with managing the Company's securities and communicating with stakeholders, have remained fairly consistent for the periods presented. Each of the annual periods include all costs associated with annual shareholders' meetings held in December of each year. However, the 2018 costs are a little higher due to transition on the Company's Board and due to costs ancillary to the private placement that was completed. Costs related specifically to the private placement were accounted for as costs of that transaction.

Both insurance expense and other costs are closely monitored, are within management expectations, and are reasonably consistent from period to period.

The Company's financing costs for the periods were as follows:

Years ended	June 18	June 17	Change
Interest expense ó long term	\$ 3,092	\$ 4,505	\$ (1,413)
Interest expense ó other	4,034	858	3,176
<b>Total financing expenses</b>	<b>\$ 7,126</b>	<b>\$ 5,363</b>	<b>\$ 1,763</b>

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### Results of Operations - continued

Three month periods ended	June 18	June 17	Change
Interest expense ó long term	\$ 611	\$ 961	\$ (350)
Interest expense ó other	2,914	355	2,559
Total financing expenses	\$ 3,525	\$ 1,316	\$ 2,209

The Company has a single long-term debt instrument outstanding, being a commercial term loan used to finance a 2014 equipment acquisition. The term loan, which matures July 2019, has a declining balance as a result of monthly principal repayments, and this results in declining interest costs.

Interest expense ó other represents interest arising from the use of the operating line as well as miscellaneous interest charges incurred. During the fourth quarter the Company resolved an HST dispute with Canada Revenue Agency which resulted in interest charges being incurred. The Company also made use of its bank operating line during the first, third and fourth quarters of 2018 thereby contributing to the rise in costs.

### Liquidity

At June 30, 2018 the Company had working capital of \$281,753 (2017- \$538,184) and current financial assets of \$479,621 (2017- \$830,960) available to settle current financial liabilities of \$780,607 (2017- \$819,904). The Company also has access to a \$250,000 bank operating line, of which \$110,000 (2017 - \$Nil) had been drawn as of June 30, 2018.

In addition to satisfying the cost of operations the Company must also address the payment or other settlement of the following amounts as at June 30, 2018:

	Due by June 2019	Due by June 2020	Due by June 2021	Due after June 2021	Total Due
Long-term debt	\$ 39,493	\$ 3,281	\$ -	\$ -	\$ 42,774
Operating leases	106,385	107,743	80,807	-	294,935
	\$ 145,878	\$ 111,024	\$ 80,807	\$ -	\$ 337,709

### Capital Resources

During the year the Company completed a private placement whereby it raised gross proceeds of \$531,250 through the issuance of 625,000 units at a price of \$0.85 per unit. Each unit was comprised of one common share and one-half (1/2) share purchase warrant. Each full share purchase warrant entitles the holder to acquire one additional common share at a price of \$1.10 until January 31, 2019. In the event that the closing price, on the Canadian Securities Exchange (öCSEö), for the Company's common shares is at least \$2.00 for twenty consecutive trading days, and that twentieth day is at least four months after the financing closes, the expiry date for the warrants will be reduced to the date that is thirty days after that twentieth trading day. The Company incurred costs of \$53,328 in connection with this financing and issued 43,750 broker warrants with each broker warrant entitling the holder to acquire one additional common share at a price of \$0.85 until January 30, 2019. The net proceeds of this financing were used to fund the Company's additional investment in Conversance Inc.

The Company has a \$250,000 commercial line of credit from which \$110,000 (2017 - \$Nil) was drawn as at June 30, 2018. The loan bears interest at the TD Bank prime lending rate plus 2.5%, is due upon demand, and is secured by a general security agreement covering the assets of PEC.

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### Related Party Transactions

All related party transactions involve key management personnel, whom the Company compensates for services rendered. These include salaries and benefits paid to Wojciech Drzazga <sup>(1)</sup> and John Perreault <sup>(2)</sup>, consulting fees and accounting fees paid to Michael D. Kindy (CFO), legal fees paid to a legal firm in which William R. Johnstone (Corporate Secretary) is a partner, Directors' fees paid to independent Directors, and share-based payments. Compensation rates are agreed to by the key management personnel and are predicated upon prevailing market rates. The following expenses, involving these related parties, have arisen during the reporting periods:

Year ended June 30	2018	2017
Salaries and benefits	\$ 270,858	\$ 271,627
Consulting fees	73,200	50,925
Directors' fees	55,640	38,940
Legal fees	65,552	27,574
Accounting fees	3,500	3,500
Legal fees accounted for as investment acquisition costs	4,750	15,000
Legal fees accounted for as share issuance costs	16,250	7,500
Cash based expenditures	\$ 489,750	\$ 415,066
Share-based payments	\$ 493,017	\$ 26,208

<sup>(1)</sup> Wojciech Drzazga was CEO of Permatest throughout the year and continues in that role as at the date of this document. He was also CEO of ZTEST until his resignation on June 15, 2018.

<sup>(2)</sup> John Perreault was President of Permatest throughout the year and continues in that role as at the date of this document. He was also President and COO of ZTEST until his resignation on December 19, 2017.

The following balances are due to related parties, and were reported in the consolidated financial statements as an element of accounts payable and accrued liabilities, as at June 30 of each year:

	2018	2017
Salaries and benefits payable	10,161	9,601
Directors' fees payable	18,264	-
Consulting fees payable	136,204	136,700
Legal fees payable	4,741	7,835

The following stock options have been issued to Directors and/or Officers of the Company and were outstanding as at June 30, 2018:

Description	Expiry Date	Number of Common Shares
Stock options @ \$0.10 per share	Dec. 31, 2018	300,000
Stock options @ \$0.05 per share	Mar. 3, 2021	400,000
Stock options @ \$0.15 per share	Dec. 21, 2021	150,000
Stock options @ \$0.95 per share	Jan. 12, 2023	600,000

During the year ended June 30, 2018, 150,000 stock options held by Directors and/or Officers of the Company were exercised, 130,000 options expired and 600,000 new stock options were granted. In addition, 50,000 stock options were exercised subsequent to June 30, 2018.

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**Convertible Instruments and Other Securities**

The Company has the following securities issued and outstanding:

Shares issued	Quantity	Amount
Common shares as at June 30, 2017	17,173,696	\$ 22,418,782
Common shares issued on exercise of stock options	200,000	37,085
Common shares issued on exercise of warrants	1,900,000	165,131
Common shares issued through private placement	625,000	531,250
Less: amount allocated to warrants <sup>(1)</sup>		(57,615)
Less: costs of the offering <sup>(2)</sup>		(67,956)
Common shares issued to acquire investment	275,000	189,200
Common shares as at June 30, 2018	20,173,696	23,215,877
Common shares issued on exercise of stock options	50,000	9,142
Common shares as at the date of this document	20,223,696	\$ 23,225,019

<sup>(1)</sup> Determined using the Black-Scholes valuation model.<sup>(2)</sup> Costs include finders' fees, legal and brokerage fees, and the value of the broker warrants as determined using the Black-Scholes valuation model.

In addition to the shares issued and outstanding the Company has issued share purchase warrants and stock options as incentives to various parties. The following list itemizes the common shares that have been reserved to satisfy the conversions and exercise of warrants and options along with the expiry date associated therewith.

Shares reserved	Expiry Date	Number of Common Shares
Common shares to be issued for Class A shares <sup>(1)</sup>		8,246
Stock options @ \$0.10 per share	Dec. 2018	300,000
Broker warrants @ \$0.85 per share	Jan. 2019	43,750
Warrants @ \$1.10 per share	Jan. 2019	312,500
Stock options @ \$0.05 per share	Mar. 2021	400,000
Warrants @ \$0.06 per share	Dec. 2021	2,900,000
Stock options @ \$0.15 per share	Dec. 2021	200,000
Stock options @ \$0.95 per share	Dec. 2021	600,000
Shares reserved as at June 30, 2018		4,764,496
Stock options @ \$0.10 per share, exercised	Dec. 2018	(50,000)
Shares reserved as at the date of this document		4,714,496

<sup>(1)</sup> Following the 2013 conversion of Class A Special Shares to common shares, 8,246 common shares remain reserved to be issued if and when the remaining Class A shareholders identify themselves to the Company.

Fully diluted number of shares	Quantity
Shares issued at June 30, 2018	20,173,696
Shares reserved at June 30, 2018	4,764,496
Fully diluted number of shares at June 30, 2018	24,938,192
Shares issued upon exercise of stock options	50,000
Reduction in shares reserved for stock options	(50,000)
Fully diluted number of shares at the date of this document	24,938,192

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**Convertible Instruments and Other Securities - continued**

Additional disclosures relative to stock options are as follows:

The following weighted average assumptions were used to calculate the fair value of the stock options granted during the years ended June 30:

	2018	2017
Dividend yield	Nil	Nil
Risk free interest rate (%)	1.62 to 1.98	1.19
Expected stock volatility (%)	99.36 to 154.07	135.35
Expected life (years)	1 - 5	5

The following provides additional details with respect to stock option changes since June 30, 2017:

	Common Shares Under Option	Weighted Average Price per Option	Weighted Average Expiry Date
Balance at June 30, 2017	1,230,000	\$ 0.09	June 20, 2020
Granted during the year	1,040,000	0.95	Aug. 27, 2021
Exercised during year	(200,000)	0.10	Jul. 27 2021
Expired during year	(570,000)	0.76	Sept. 14 2017
Balance at June 30, 2018	1,500,000	0.43	Aug. 2, 2021
Exercised subsequent to June 30, 2018	(50,000)	0.10	Dec. 31, 2018
Balance as at the date of this document	1,450,000	\$ 0.09	Sept. 4, 2021

As at the date of this document the following stock options are outstanding:

	Common Shares Under Option	Exercise Price	Expiry Date
Granted December 31, 2013	250,000 <sup>(1)</sup>	\$ 0.10	Dec. 31, 2018
Granted March 3, 2016	400,000 <sup>(1)</sup>	\$ 0.05	Mar. 3, 2021
Granted December 21, 2016	150,000 <sup>(1)</sup>	\$ 0.15	Dec. 21, 2021
Granted December 21, 2016	50,000	\$ 0.15	Dec. 21, 2021
Granted January 12, 2018	600,000 <sup>(1)</sup>	\$ 0.95	Jan. 12, 2023

<sup>(1)</sup> Directors and/or Officers of the Company hold these options.

All stock options have vested. The Company has no ability to cause these options to be exercised.

Additional disclosures relative to share purchase warrants are as follows:

The following weighted average assumptions were used to calculate the fair value of the warrants issued during the years ended June 30:

	2018	2017
Dividend yield	Nil	Nil
Risk free interest rate (%)	1.61	1.20
Expected stock volatility (%)	70.49	130.19
Expected life (years)	1	5

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### Convertible Instruments and Other Securities - continued

The following provides additional details with respect to changes in warrants since June 30, 2017:

	Number of Warrants	Weighted Average Price per Warrant	Weighted Average Expiry Date
Balance at June 30, 2017	4,900,000	\$ 0.06	Aug. 14, 2021
Issued during the year	356,250	1.07	Jan. 30, 2019
Exercised during the year	(1,900,000)	0.07	Apr. 21, 2021
Expired during the year	(100,000)	0.10	Oct. 31, 2017
Balance at June 30, 2018 and as at the date of this document	3,256,250	\$ 0.17	Aug. 22, 2021

As at the date of this document the following share purchase warrants are outstanding:

	Number of Warrants	Exercise Price	Expiry Date
Issued Dec. 15, 2016	2,900,000	\$ 0.06	Dec. 15, 2021
Issued Jan. 30, 2018	43,750	\$ 0.85	Jan. 30, 2019
Issued Jan. 30, 2018	312,500	\$ 1.10	Jan. 30, 2019

### Changes in Accounting Policy

The accounting policies followed by the Company are established in accordance with International Financial Reporting Standards (IFRS) and once policies are established they will not, as a matter of policy, be revised unless IFRS changes. There were no changes in accounting policy during the current period.

### Accounting Standards Effective For Future Periods

IFRS 9, *Financial Instruments*: effective for annual periods beginning on or after January 1, 2018, establishes principles for the financial reporting of financial assets and financial liabilities that will present relevant and useful information to users of the financial statements for their assessment of the amounts, timing, and uncertainty of future cash flows.

IFRS 15, *Revenue from Contracts with Customers*: effective for annual periods beginning on or after January 1, 2018, replaces existing revenue standards and interpretations with a single standard and provides additional guidance on revenue recognition for contracts with customers.

The Company has completed its assessment and there will be no material impact upon the financial statements when these standards are adopted for the year beginning July 1, 2018.

### Financial Instruments

The Company's financial instruments are comprised of the following:

#### Financial assets:

Cash

Accounts receivable

#### Classification

Fair value through profit and loss

Loans and receivables

#### Financial liabilities:

Bank indebtedness

Customer deposits

Accounts payable and accrued liabilities

Long-term debt

#### Classification

Other financial liabilities

Other financial liabilities

Other financial liabilities

Other financial liabilities

## **ZTEST Electronics Inc.**

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### **Financial Instruments - continued**

#### Fair value through profit and loss:

Financial assets are designated as fair value through profit and loss if they were acquired principally for the purpose of selling in the short term. Fair value through profit and loss assets are recognized and carried at their fair value.

#### Loans and receivables:

Loans and receivables are financial assets with fixed or determinable payments that are not quoted in an active market. Such assets are initially recognized at fair value plus any directly attributable transaction costs. Subsequent to initial recognition, loans and receivables are measured at amortized cost using the effective interest method, less any impairment losses.

#### Other financial liabilities:

Other financial liabilities are recognized initially at fair value, net of any directly attributable transaction costs. Subsequent to initial recognition these financial liabilities are measured at amortized cost using the effective interest method. The effective interest method is a method of calculating the amortized cost of a financial instrument and of allocating interest and any transaction costs over the relevant period. The effective interest rate is the rate that exactly discounts estimated future cash payments through the expected life of the financial instrument to the net carrying amount on initial recognition. Other financial liabilities are de-recognized when the obligations are discharged, cancelled or expired.

#### Impairment of financial assets:

Financial assets are assessed for indicators of impairment at the end of each reporting period. Financial assets are impaired when there is objective evidence that, as a result of one or more events that occurred after the initial recognition of the financial assets, the estimated future cash flows of the assets have been negatively impacted.

Evidence of impairment could include:

- significant financial difficulty of the issuer or counterparty; or
- default or delinquency in interest or principal payments; or
- it becoming probable that the borrower will enter bankruptcy or financial re-organization.

The carrying amount of financial assets is reduced by any impairment loss directly for all financial assets with the exception of accounts receivable, where the carrying amount is reduced through the use of an allowance account. When an account receivable is considered uncollectible, it is written off against the allowance account. Subsequent recoveries of amounts previously written off are credited against the allowance account. Changes in the carrying amount of the allowance account are recognized in income for the period.

If, in a subsequent period, the amount of the impairment loss decreases and the decrease can be related objectively to an event occurring after the impairment was recognized, the previously recognized impairment loss is reversed through income for the period to the extent that the carrying amount of the asset at the date the impairment is reversed does not exceed what the amortized cost would have been had the impairment not been recognized.

#### Financial instruments recorded at fair value:

Financial instruments recorded at fair value are classified using a fair value hierarchy that reflects the significance of the inputs used in making the measurements. The fair value hierarchy has the following levels:

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

## **ZTEST Electronics Inc.**

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### **Financial Instruments - continued**

At June 30, 2017, cash was measured at fair value and classified within Level 1 of the fair value hierarchy.

#### **Financial instruments recorded at amortized cost:**

Financial instruments recorded at amortized cost are amortized using the market rates of interest prevailing at the inception of the financial instrument applied to expected future cash flows. The amortized cost is recomputed in the event that the underlying terms, and therefore the expected future cash flows, of the financial instrument are altered with any change in the amortized cost being charged to income for the period.

### **Impairment of Non-financial Assets**

At the end of each reporting period, the Company reviews the carrying amounts of its non-financial assets with finite lives to determine whether there is any indication that those assets have suffered an impairment loss.

Where such an indication exists, the recoverable amount of the asset is estimated in order to determine the extent of the impairment loss. The recoverable amount is the higher of an asset's fair value less cost to sell or its value in use. Fair value is determined as the amount that would be obtained from the sale of the asset in an arm's length transaction between knowledgeable and willing parties. In assessing value in use, the estimated future cash flows are discounted to their present value using a pre-tax discount rate that reflects current market assessments of the time value of money and the risks specific to the asset. If the recoverable amount of an asset is estimated to be less than its carrying amount, the carrying amount of the asset is reduced to its recoverable amount and the impairment loss is recognized in the income for the period.

Where an impairment loss subsequently reverses, the carrying amount of the asset is increased to the revised estimate of its recoverable amount, but so that the increased carrying amount does not exceed the carrying amount that would have been determined had no impairment loss been recognized for the asset in prior years. A reversal of an impairment loss is recognized immediately in income for the period.

The Company has assessed the assets of each of its operating entities and has determined that no impairment provision (2017 - \$294,562) is required.

### **Risk Factors**

Events seemingly unrelated to the Company, or to its industry, may adversely affect its finances or operations in ways that are hard to predict or defend against. For example, credit contraction in financial markets may hamper the Company's ability to access credit when needed or rapid changes in foreign exchange rates may adversely affect its financial results. Finally, a reduction in credit, combined with reduced economic activity, may adversely affect businesses and industries that constitute a significant portion of the Company's customer base. As a result, these customers may need to reduce their purchases, or the Company may experience greater difficulty in collecting amounts due from them. Any of these events, or others caused by uncertainty in world financial markets, may have a material adverse effect on the Company's business, operating results, and financial condition.

In addition to the foregoing, the Company is exposed to credit risk, concentration of credit risk, liquidity risk, and currency risk. The Company's primary risk management objective is to protect earnings and cash flow and, ultimately, shareholder value. Risk management strategies, as discussed below, are designed and implemented to ensure that the Company's risks and the related exposure are consistent with its business objectives and risk tolerance. There have been no changes to the risk management strategies during the current year.

## **ZTEST Electronics Inc.**

Management's Discussion and Analysis

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### **Risk Factors - continued**

#### Credit risk

Credit risk is the risk that one party to a financial instrument will fail to discharge an obligation and cause the other party to incur a financial loss. The Company's primary exposure to credit risk is in its accounts receivable. In an effort to mitigate this risk, management actively manages and monitors its receivables and obtains pre-payments where warranted. It has been determined that no allowance is required, as all amounts outstanding are considered collectible. The Company incurred bad debts of \$Nil (2017 - \$1,286) during the year ended June 30, 2018.

#### Concentration of credit risk

Concentration of credit risk arises when one or more customers, defined as a major customer, individually account for 10% or more of the Company's revenues during a financial reporting period. During the current year the Company had three major customers which represented 12%, 12% and 10% of total revenues. In the prior year one major customer accounted for 14% of revenues. Amounts due from major customers represented 27% of accounts receivable at June 30, 2018 (2017 - 11%). The loss of a major customer, or significant curtailment of purchases by such customer, could have a material adverse effect on the Company's results of operations and financial condition. The Company monitors the relationship with all customers closely and ensures that every customer is subject to the same risk management criteria.

#### Liquidity risk

Liquidity risk arises through the excess of financial obligations over available financial assets due at any point in time. At June 30, 2018 the Company had current financial assets of \$479,621 (2017 - \$830,960) available to settle current financial liabilities of \$780,607 (2017 - \$819,904). The Company manages its liquidity risk through the management of its capital (*note 13*) which incorporates the continuous monitoring of actual and projected cash flows to ensure that it has sufficient liquidity to meet its operating commitments without incurring unacceptable losses or risking damage to the Company's reputation.

#### Market risks

The Company is exposed to interest rate risk due to two obligations that have floating interest rates as well as currency risk related to cash, accounts receivable, prepaid expenses, customer deposits and accounts payable denominated in US dollars. Market risks give rise to the potential for future cash flows to fluctuate because of changes in interest rates or foreign exchange rates. Market risks are closely monitored and attempts are made to match foreign cash inflows and outflows. During the current fiscal year, the Company has reported a foreign exchange gain of \$1,982 (2017's gain of \$7,705).

#### Sensitivity to market risks

At June 30, 2018 the Company had \$42,784 (2017's \$82,277) in long term debt and a bank operating loan in the amount of \$110,000 (2017's \$Nil) each of which bears interest predicated upon the TD Bank prime lending rate. The bank operating loan is revolving in nature, meaning it may increase or decrease in accordance with daily cash requirements. In the event the amount due on the operating loan remains at current levels, a 1% increase in the TD Bank prime lending rate, as at the financial reporting date, would result in additional interest expense on long-term debt of \$255 and interest expense on other of \$1,100 over the next 12 month period.

At June 30, 2018 the Company had an overdraft of US\$16,417 (2017's US \$46,339 cash) included in bank indebtedness or cash. A 5% increase in the value of the Canadian dollar relative to the US dollar would result in a reduction of \$265 in carrying value.

At June 30, 2018 the Company had US\$4,634 (2017's US \$3,488) included in prepaid expenses. A 5% increase in the value of the Canadian dollar relative to the US dollar would result in a recognition of \$75 in additional future expenses.

At June 30, 2018 the Company had US\$63,433 (2017's US \$56,360) included in accounts receivable. A 5% increase in the value of the Canadian dollar relative to the US dollar would result in a reduction of \$1,026 in future cash inflow.

## **ZTEST Electronics Inc.**

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### **Risk Factors - continued**

#### **Sensitivity to market risks - continued**

At June 30, 2018 the Company had US\$27,879 (2017 ó US \$63,707) included in customer deposits. A 5% increase in the value of the Canadian dollar relative to the US dollar would result in a reduction of \$451 in future revenue.

At June 30, 2018 the Company had US\$119,219 (2017 ó US\$195,669) included in accounts payable. A 5% decrease in the value of the Canadian dollar relative to the US dollar would result in an increase of \$1,928 in future cash outflow.

Based upon observations of recent market trends management believes that each of these outcomes is possible.

### **Forward-looking Information**

Certain statements in this MD&A may constitute "forward-looking" statements which involve known and unknown risks, uncertainties and other factors which may cause the actual results, performance or achievements of the Company and its subsidiary, or the industry in which they operate, to be materially different from any future results, performance or achievements expressed or implied by such forward-looking statements. When used in this report, the words "estimate", "believe", "anticipate", "intend", "expect", "plan", "may", "should", "will", the negative thereof or other variations thereon or comparable terminology are intended to identify forward-looking statements. Such forward-looking statements reflect the current expectations of the management of the Company with respect to future events based on currently available information and are subject to risks and uncertainties that could cause actual results, performance or achievements to differ materially from those expressed or implied by those forward-looking statements, such as reduced funding, long sales cycles, currency and interest rate fluctuations, increased competition and general economic and market factors and including the risk factors summarized above under the heading "Risk Factors". New risk factors may arise from time to time and it is not possible for management of the Company to predict all of those risk factors or the extent to which any factor or combination of factors may cause actual results, performance or achievements of the Company to be materially different from those expressed or implied in such forward-looking statements. Given these risks and uncertainties, investors should not place undue reliance on forward-looking statements as a prediction of actual results.

Although the forward-looking statements contained in this MD&A are based upon what management believes to be reasonable assumptions, the Company cannot assure investors that actual results will be consistent with these forward-looking statements. The forward-looking statements contained in this MD&A speak only as of the date hereof. The Company does not undertake or assume any obligation to release publicly any revisions to these forward-looking statements to reflect events or circumstances after the date hereof or to reflect the occurrence of unanticipated events, except as required by law.