

Lightwave Logic, Inc.  
Form 10-Q  
August 12, 2015

**UNITED STATES**  
**SECURITIES AND EXCHANGE COMMISSION**  
**Washington, D.C. 20549**

---

**FORM 10-Q**

---

**(Mark One)**

**☐ QUARTERLY REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934**

For the quarterly period ended June 30, 2015

**OR**

**☐ TRANSITION REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934**

For the transition period from \_\_\_\_\_ to \_\_\_\_\_

Commission File Number 0-52567

**Lightwave Logic, Inc.**

(Exact name of registrant as specified in its charter)

**Nevada**

**82-049-7368**

(State or other jurisdiction of  
Incorporation or Organization)

(I.R.S. Employer Identification No.)

**1831 Lefthand Circle, Suite C**

**Longmont, CO**

**80501**

(Address of principal executive offices)

(Zip Code)

**(720) 340-4949**

(Registrant's telephone number, including area code)

Indicate by check mark whether the registrant (1) has filed all reports required to be filed by Section 13 or 15(d) of the Securities Exchange Act of 1934 during the preceding 12 months (or for such shorter period that the registrant was required to file such reports), and (2) has been subject to such filing requirements for the past 90 days. Yes  No

Indicate by check mark whether the registrant has submitted electronically and posted on its corporate Website, if any, every Interactive Data File required to be submitted and posted pursuant to Rule 405 of Regulation S-T (§232.405 of this chapter) during the preceding 12 months (or for such shorter period that the registrant was required to submit and post such files). Yes  No

Indicate by check mark whether the registrant is a large accelerated filer, an accelerated filer, a non-accelerated filer or a smaller reporting company. See the definitions of "large accelerated filer," "accelerated filer" and "smaller reporting company" in Rule 12b-2 of the Exchange Act (Check one):

Large accelerated filer	<input type="checkbox"/>	Accelerated filer	<input type="checkbox"/>
Non-accelerated filer	<input type="checkbox"/>	Smaller reporting company	<input checked="" type="checkbox"/>

Indicate by check mark whether the registrant is a shell company (as defined in Rule 12b-2 of the Exchange Act.) Yes  No

The number of shares of the registrant's Common Stock outstanding as of August 11, 2015 was 61,247,593.

---

**TABLE OF CONTENTS**

		<b>Page</b>
Part I	Financial Information	
	<u>Item 1</u>	<u>Financial Statements</u> 1
	<u>Item 2</u>	<u>Management's Discussion and Analysis of Financial Condition and Results of Operations</u> 13
	<u>Item 4</u>	<u>Controls and Procedures</u> 22
Part II	Other Information	
	<u>Item 2</u>	<u>Unregistered Sales of Equity Securities and Use of Proceeds</u> 23
	<u>Item 5</u>	<u>Other Information</u> 23
	<u>Item 6</u>	<u>Exhibits</u> 23
		<u>Signatures</u> 25

### **Forward-Looking Statements**

This report on Form 10-Q contains, and our officers and representatives may from time to time make, "forward-looking statements" within the meaning of the safe harbor provisions of the U.S. Private Securities Litigation Reform Act of 1995. Forward-looking statements can be identified by words such as: "anticipate," "intend," "plan," "goal," "seek," "believe," "project," "estimate," "expect," continuing, ongoing, "strategy," "future," "likely," "may," "should," could, "will" and similar references to future periods. Examples of forward-looking statements include, among others, statements we make regarding expected operating results, such as anticipated revenue; anticipated levels of capital expenditures for our current fiscal year; our belief that we have sufficient liquidity to fund our business operations during the next nine months; strategy for gaining customers, growth, product development, market position, financial results and reserves.

Forward-looking statements are neither historical facts nor assurances of future performance. Instead, they are based only on our current beliefs, expectations and assumptions regarding the future of our business, future plans and strategies, projections, anticipated events and trends, the economy and other future conditions. Because forward-looking statements relate to the future, they are subject to inherent uncertainties, risks and changes in circumstances that are difficult to predict and many of which are outside of our control. Our actual results and financial condition may differ materially from those indicated in the forward-looking statements. Therefore, you should not rely on any of these forward-looking statements. Important factors that could cause our actual results and financial condition to differ materially from those indicated in the forward-looking statements include, among others, the following: lack of available funding; general economic and business conditions; competition from third parties; intellectual property rights of third parties; regulatory constraints; changes in technology and methods of marketing; delays in completing various engineering and manufacturing programs; changes in customer order patterns; changes in product mix; success in technological advances and delivering technological innovations; shortages in components; production delays due to performance quality issues with outsourced components; those events and factors described by us in Item 1.A Risk Factors in our most recent Annual Report on Form 10-K; other risks to which our Company is subject; other factors beyond the Company's control.

Any forward-looking statement made by us in this report on Form 10-Q is based only on information currently available to us and speaks only as of the date on which it is made. We undertake no obligation to publicly update any forward-looking statement, whether written or oral, that may be made from time to time, whether as a result of new information, future developments or otherwise.



**PART I FINANCIAL INFORMATION**

**Item 1**

**Financial Statements**

**LIGHTWAVE LOGIC, INC.**

**FINANCIAL STATEMENTS**

**JUNE 30, 2015**

**(UNAUDITED)**

	<b>Page</b>
Balance Sheets	2
Statements of Operations	3
Statement of Stockholders' Equity	4
Statements of Cash Flow	5
Notes to Financial Statements	6





**LIGHTWAVE LOGIC, INC.****BALANCE SHEETS**

	<b>June 30,</b>	<b>December 31,</b>
	<b>2015</b>	<b>2014</b>
	<b>(Unaudited)</b>	<b>(Audited)</b>
<b>ASSETS</b>		
<b>CURRENT ASSETS</b>		
Cash and cash equivalents	\$ 2,920,352	\$ 3,165,940
Prepaid expenses	267,054	128,227
	3,187,406	3,294,167
<b>PROPERTY AND EQUIPMENT - NET</b>	<b>522,171</b>	<b>375,227</b>
<b>OTHER ASSETS</b>		
Intangible assets - net	612,848	610,029
<b>TOTAL ASSETS</b>	<b>\$ 4,322,425</b>	<b>\$ 4,279,423</b>
<b>LIABILITIES AND STOCKHOLDERS' EQUITY</b>		
<b>CURRENT LIABILITIES</b>		
Accounts payable	\$ 78,187	\$ 178,165
Accounts payable and accrued expenses- related parties	15,672	10,323
Accrued expenses	55,910	33,353
<b>TOTAL LIABILITIES</b>	<b>149,769</b>	<b>221,841</b>
<b>STOCKHOLDERS' EQUITY</b>		
Preferred stock, \$0.001 par value, 1,000,000 authorized, No shares issued or outstanding		
Common stock \$0.001 par value, 250,000,000 authorized, 61,247,593 and 58,381,854 issued and outstanding at June 30, 2015 and December 31, 2014	61,248	58,382
Additional paid-in-capital	42,983,064	40,753,189
Accumulated deficit	(38,871,656)	(36,753,989)
<b>TOTAL STOCKHOLDERS' EQUITY</b>	<b>4,172,656</b>	<b>4,057,582</b>
<b>TOTAL LIABILITIES AND STOCKHOLDERS' EQUITY</b>	<b>\$ 4,322,425</b>	<b>\$ 4,279,423</b>

Edgar Filing: Lightwave Logic, Inc. - Form 10-Q  
See accompanying notes to these financial statements.

2

---

**LIGHTWAVE LOGIC, INC.**  
**STATEMENTS OF OPERATIONS**  
**FOR THE THREE MONTHS AND SIX MONTHS ENDING JUNE 30, 2015 AND 2014**  
**(UNAUDITED)**

	<b>For the Three Months Ending June 30,</b>		<b>For the Six Months Ending June 30,</b>		
	<b>2015</b>	<b>2014</b>	<b>2015</b>	<b>2014</b>	
NET SALES	\$	\$	\$	\$	2,500
COST AND EXPENSE					
Research and development	619,492	618,454	1,264,698		1,203,892
General and administrative	432,846	392,917	853,092		795,081
	1,052,338	1,011,371	2,117,790		1,998,973
LOSS FROM OPERATIONS	(1,052,338)	(1,011,371)	(2,117,790)		(1,996,473)
OTHER INCOME (EXPENSE)					
Interest income	62	62	123		124
Commitment fee and interest expense					(2,742)
NET LOSS	\$ (1,052,276)	\$ (1,011,309)	\$ (2,117,667)	\$	(1,999,091)
Basic and Diluted Loss per Share	\$ (0.02)	\$ (0.02)	\$ (0.04)	\$	(0.04)
Basic and Diluted	58,949,676	53,478,623	58,968,556		53,123,623

Weighted  
Average  
Number of  
Shares

See accompanying notes to these financial statements.

**LIGHTWAVE LOGIC, INC.**  
**STATEMENT OF STOCKHOLDERS EQUITY**  
**JUNE 30, 2015**  
**(UNAUDITED)**

	<b>Number of Shares</b>		<b>Common Stock</b>		<b>Paid-in Capital</b>		<b>Accumulated Deficit</b>		<b>Total</b>
BALANCE AT DECEMBER 31, 2014	58,381,854	\$	58,382	\$	40,753,189	\$	(36,753,989)	\$	4,057,582
Common stock issued in private placement	2,816,199		2,816		1,912,184				1,915,000
Common stock issued for services	49,540		50		40,526				40,576
Options issued for services					221,511				221,511
Warrants issued for services					55,654				55,654
Net loss for the six months ending June 30, 2015							(2,117,667)		(2,117,667)
BALANCE AT JUNE 30, 2015	61,247,593	\$	61,248	\$	42,983,064	\$	(38,871,656)	\$	4,172,656

See accompanying notes to these financial statements.



**LIGHTWAVE LOGIC, INC.**  
**STATEMENTS OF CASH FLOW**  
**FOR THE SIX MONTHS ENDING JUNE 30, 2015 AND 2014**  
**(UNAUDITED)**

	<b>For the Six Months Ending June 30,</b>	
	<b>2015</b>	<b>2014</b>
<b>CASH FLOWS FROM OPERATING ACTIVITIES</b>		
Net loss	\$ (2,117,667)	\$ (1,999,091)
Adjustment to reconcile net loss to net cash used in operating activities		
Warrants issued for services	55,654	72,701
Stock options issued for services	221,511	345,189
Common stock issued for services and fees	40,576	4,742
Depreciation and amortization	81,584	71,502
(Increase) decrease in assets		
Prepaid expenses and other current assets	(138,827)	(66,071)
Increase (decrease) in liabilities		
Accounts payable	(99,978)	37,783
Accounts payable and accrued expenses- related parties	5,349	5,732
Accrued expenses	22,557	24,660
Net cash used in operating activities	(1,929,241)	(1,502,853)
<b>CASH FLOWS FROM INVESTING ACTIVITIES</b>		
Cost of intangibles	(10,250)	(36,785)
Purchase of property and equipment	(221,097)	(92,239)
Net cash used in investing activities	(231,347)	(129,024)
<b>CASH FLOWS FROM FINANCING ACTIVITIES</b>		
Issuance of common stock, private placement	1,915,000	2,060,000
Issuance of common stock, exercise of options and warrants		153,830
Issuance of common stock, institutional investor		177,660
Net cash provided by financing activities	1,915,000	2,391,490
<b>NET INCREASE (DECREASE) IN CASH AND CASH EQUIVALENTS</b>		
	(245,588)	759,613
	3,165,940	2,270,704

CASH AND CASH EQUIVALENTS - BEGINNING OF PERIOD

CASH AND CASH EQUIVALENTS - END OF PERIOD	\$	2,920,352	\$	3,030,317
---	----	-----------	----	-----------

See accompanying notes to these financial statements.



**LIGHTWAVE LOGIC, INC.**

**NOTES TO FINANCIAL STATEMENTS**

**JUNE 30, 2015 AND 2014**

**NOTE 1 NATURE OF BUSINESS AND SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES**

**Financial Statements**

The accompanying unaudited financial statements have been prepared by Lightwave Logic, Inc. (the Company). These statements include all adjustments (consisting only of its normal recurring adjustments) which management believes necessary for a fair presentation of the statements and have been prepared on a consistent basis using the accounting polices described in the Summary of Accounting Policies included in the 2014 Annual Report. Certain financial information and footnote disclosures normally included in financial statements prepared in accordance with accounting principles generally accepted in the United States have been condensed or omitted pursuant to the rules and regulations of the Securities and Exchange Commission, although the Company firmly believes that the accompanying disclosures are adequate to make the information presented not misleading. The financial statements should be read in conjunction with the financial statements and notes thereto included in the Company's Annual Report on Form 10-K for the year ended December 31, 2014, as filed with the Securities and Exchange Commission. The interim operating results for the three and six months ending June 30, 2015 may not be indicative of operating results expected for the full year.

**Nature of Business**

Lightwave Logic, Inc. is a technology Company focused on the development of next generation photonic devices and non-linear optical polymer materials systems for applications in high speed fiber-optic data communications and optical computing markets. Currently the Company is in various stages of photonic device and materials development and evaluation with potential customers and strategic partners. The Company expects the next revenue stream to be in sales of non-linear optical polymers, prototype devices and product development agreements prior to moving into production.

The Company's current development activities are subject to significant risks and uncertainties, including failing to secure additional funding to operationalize the Company's technology now under development.

## Stock-based Payments

The Company accounts for stock-based compensation under the provisions of FASB ASC 718, "Compensation - Stock Compensation" which requires the measurement and recognition of compensation expense for all stock-based awards made to employees and directors based on estimated fair values on the grant date. The Company estimates the fair value of stock-based awards on the date of grant using the Black-Scholes model. The value of the portion of the award that is ultimately expected to vest is recognized as expense over the requisite service periods using the straightline method. The Company accounts for stock-based compensation awards to nonemployees in accordance with FASB ASC 505-50, "Equity-Based Payments to Non-Employees ( ASC 505-50 ). Under ASC 505-50, the Company determines the fair value of the warrants or stock-based compensation awards granted as either the fair value of the consideration received or the fair value of the equity instruments issued, whichever is more reliably measurable. All issuances of stock options or other equity instruments to non-employees as consideration for goods or services received by the Company are accounted for based on the fair value of the equity instruments issued. Any stock options issued to non-employees are recorded as an expense and additional paid in capital in stockholders' equity over the applicable service periods. Non-employee equity based payments that do not vest immediately upon grant are recorded as an expense over the service period, as if the Company had paid cash for the services. At the end of each financial reporting period, prior to vesting or prior to the completion of the services, the fair value of the equity based payments will be re-measured and the non-cash expense recognized during the period will be adjusted accordingly. Since the fair value of equity based payments granted to non-employees is subject to change in the future, the amount of the future expense will include fair value re-measurements until the equity based payments are fully vested or the service completed.

**LIGHTWAVE LOGIC, INC.**

**NOTES TO FINANCIAL STATEMENTS**

**JUNE 30, 2015 AND 2014**

**NOTE 1 NATURE OF BUSINESS AND SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES  
(CONTINUED)**

**Loss per Share**

The Company follows Financial Accounting Standards Board Accounting Standards Codification ( FASB ASC ) 260, Earnings per Share , resulting in the presentation of basic and diluted earnings per share. Because the Company reported a net loss in 2015 and 2014, common stock equivalents, including stock options and warrants were anti-dilutive; therefore, the amounts reported for basic and dilutive loss per share were the same.

**Comprehensive Income**

The Company follows FASB ASC 220.10, Reporting Comprehensive Income. Comprehensive income is a more inclusive financial reporting methodology that includes disclosure of certain financial information that historically has not been recognized in the calculation of net income. Since the Company has no items of other comprehensive income, comprehensive income (loss) is equal to net income (loss).

**Recently Issued Accounting Pronouncements Not Yet Adopted**

As of June 30, 2015, there are no recently issued accounting standards not yet adopted which would have a material effect on the Company's financial statements through 2016.

**Recently Adopted Accounting Pronouncements**

As of June 30, 2015 and for the period then ended, there were no recently adopted accounting pronouncements that had a material effect on the Company's financial statements.

**NOTE 2 MANAGEMENT'S PLANS**

As a technology company focusing on the development of the next generation photonic devices and non-linear optical polymer materials systems, substantial net losses have been incurred since inception. The Company has satisfied capital requirements since inception primarily through the issuance and sale of its common stock. The Company currently has a cash position of approximately \$2,670,000. Based upon the current cash position and expenditures of approximately \$275,000 per month and no debt service, management believes the Company has sufficient funds currently to finance its operations through April 2016. In June 2013, the Company signed an agreement with an institutional investor to sell up to \$20 million of common stock. Under the agreement subject to certain conditions and at the Company's sole discretion, the institutional investor has committed to invest up to \$20 million in the Company's common stock over a 30-month period with the remaining available amount of \$18,485,352. The Company filed a registration statement with the U.S. Securities and Exchange Commission covering the resale of the shares that may be issued to the institutional investor. The Company recently raised \$1,915,000 from an equity private placement. Historically the Company has successfully raised sufficient cash to fund its operations.

**LIGHTWAVE LOGIC, INC.****NOTES TO FINANCIAL STATEMENTS****JUNE 30, 2015 AND 2014****NOTE 3 PROPERTY AND EQUIPMENT**

Property and equipment consists of the following:

	<b>June 30,</b>		<b>December 31,</b>
	<b>2015</b>		<b>2014</b>
Office equipment	\$ 51,322	\$	51,322
Lab equipment	663,749		544,858
Furniture	26,028		18,782
Leasehold Improvements	231,859		136,900
	972,958		751,862
Less: Accumulated depreciation	450,787		376,635
	\$ 522,171	\$	375,227

Depreciation expense for the six months ending June 30, 2015 and 2014 was \$74,153 and \$64,071. Depreciation expense for the three months ending June 30, 2015 and 2014 was \$37,407 and \$33,862.

**NOTE 4 INTANGIBLE ASSETS**

This represents legal fees and patent fees associated with the prosecution of patent applications. The Company has recorded amortization expenses on the Spacer and Chromophore patents granted by the United States Patent and Trademark Office in February 2011, April 2011 and September 2012, which are amortized over its legal life of 20 years and Chromophore patent granted by the Australian Patent Office in November 2012 which is amortized over its legal life of 20 years. Certain patent applications are abandoned by the Company when the claims are covered by patents already granted to the Company. Patent applications abandoned have been written off at full capitalized cost. No amortization expense has been recorded on the remaining patent applications since patents have yet to be granted. Once the patents are granted, the cost of the patents will be amortized over their legal lives, which is generally 20 years.

Patents consists of the following:

	<b>June 30,</b>		<b>December 31,</b>
	<b>2015</b>		<b>2014</b>
Patents	\$ 670,835	\$	660,586
Less: Accumulated amortization	57,987		50,557
	\$ 612,848	\$	610,029

Amortization expense for the six months ending June 30, 2015 and 2014 was \$7,431 and \$7,431. Amortization expense for the three months ending June 30, 2015 and 2014 was \$3,716 and \$3,716. Expense for abandoned patents for claims covered by patents already granted to the Company are recorded in research and development expenses and for the three months and six months ending June 30, 2015 and 2014 were \$0 and \$0.

**LIGHTWAVE LOGIC, INC.**

**NOTES TO FINANCIAL STATEMENTS**

**JUNE 30, 2015 AND 2014**

**NOTE 5 INCOME TAXES**

There is no income tax benefit for the losses for the three and six months ended June 30, 2015 and 2014 since management has determined that the realization of the net deferred tax asset is not assured and has created a valuation allowance for the entire amount of such benefits.

The Company's policy is to record interest and penalties associated with unrecognized tax benefits as additional income taxes in the statement of operations. As of January 1, 2015, the Company had no unrecognized tax benefits, or any tax related interest or penalties. There were no changes in the Company's unrecognized tax benefits during the period ended June 30, 2015. The Company did not recognize any interest or penalties during 2015 related to unrecognized tax benefits. With few exceptions, the U.S. and state income tax returns filed for the tax years ending on December 31, 2011 and thereafter are subject to examination by the relevant taxing authorities.

**NOTE 6 STOCKHOLDERS EQUITY**

**Preferred Stock**

Pursuant to the Company's Articles of Incorporation, the Company's board of directors is empowered, without stockholder approval, to issue series of preferred stock with any designations, rights and preferences as they may from time to time determine. The rights and preferences of this preferred stock may be superior to the rights and preferences of the Company's common stock; consequently, preferred stock, if issued could have dividend, liquidation, conversion, voting or other rights that could adversely affect the voting power or other rights of the common stock. Additionally, preferred stock, if issued, could be utilized, under special circumstances, as a method of discouraging, delaying or preventing a change in control of the Company's business or a takeover from a third party.

**Common Stock and Warrants**

In January 2010, the Company issued a warrant to purchase 650,000 shares of common stock at a purchase price of \$1.51 per share to a new member of its board of directors serving as the Company's full-time non-executive chair of the board of directors. Using the Black-Scholes Option Pricing Formula, the warrants were valued at \$1,188,000, fair value, vesting 162,500 immediately and the remaining in annual equal installments of 162,500 over the next three years. The warrant expires in 5 years. During 2011, the warrant to purchase 650,000 shares of common stock, of which 487,500 shares were vested, forfeited. For the year ending December 31, 2011 and 2010, the Company recognized \$306,765 and \$580,167 of expense. The warrant to purchase 487,500 shares of common stock expired in January 2015.

In June 2013, the Company signed a Purchase Agreement and Registration Rights Agreement with an institutional investor to sell up to \$20,000,000 of common stock. Under the agreement subject to certain conditions and at the Company's sole discretion, the institutional investor has committed to invest up to \$20,000,000 in the Company's common stock over a 30-month period. The Company filed the registration statement with the U.S. Securities and Exchange Commission in September 2013. A Post Effective Amendment was filed during May 2015. The institutional investor is obligated to make purchases as the Company directs in accordance with the agreement, which may be terminated by the Company at any time, without cost or penalty. Sales of shares will be made in specified amounts and at prices that are based upon the market prices of the Company's common stock immediately preceding the sales to the institutional investor. In June 2013, the Company issued 200,000 shares of restricted common stock to the institutional investor as an initial commitment fee valued at \$170,000, fair value and 400,000 shares of common stock are reserved for additional commitment fees to the institutional investor in accordance with the terms of the agreement. During June 2013 through June 2015, the institutional investor purchased 1,563,648 shares of common stock for proceeds of \$1,514,647 and the Company issued 23,272 shares of common stock as additional commitment fee, valued at \$24,745, fair value, leaving 376,728 in reserve for additional commitment fees.



**LIGHTWAVE LOGIC, INC.**

**NOTES TO FINANCIAL STATEMENTS**

**JUNE 30, 2015 AND 2014**

**NOTE 6 STOCKHOLDERS EQUITY (CONTINUED)**

**Common Stock and Warrants (Continued)**

During June 2014, July 2014, August 2014, September 2014, October 2014, November 2014, December 2014, January 2015, February 2015, March 2015, April 2015 and May 2015 the Company issued 2,371, 2,081, 1,897, 2,121, 2,408, 2,322, 2,487, 2,524, 2,576, 2,316, 2,295 and 2,329 shares of common stock, respectively to a director serving as a member of the Company's Operations Committee valued each issuance at \$2,000, fair value. For the six months ending June 30, 2015 and 2014, the Company recognized \$10,000 and \$2,000 of expense. For the three month ending June 30, 2015 and 2014, the Company recognized \$4,000 and \$2,000 of expense.

In January, February, March, April, May and June 2015, the Company issued 6,250, 6,250, 6,250, 6,250, 6,250 and 6,250 shares of common stock, respectively to a firm for investor relations services fair valued at \$5,062, \$4,938, \$5,250, \$5,438, \$4,944, and \$4,944 fair value. For the six month ending June 30, 2015, the Company recognized \$30,575 of expense. For the three month ending June 30, 2015, the Company recognized \$15,325 of expense.

In December 2014, the board of directors approved a grant to a senior advisor effective January 1, 2015 of a warrant to purchase up to 100,000 shares of common stock at a purchase price of \$0.77 per share. Using the Black-Scholes Option Pricing Formula, the warrant was valued at \$48,656, fair value. The warrant expires in 5 years and vests 25,000 immediately and the remaining in equal monthly installments of 7,500 over the next 10 months. The warrant is expensed over the vesting terms. For the six month ending June 30, 2015, the Company recognized \$24,128 of expense. For the three month ending June 30, 2015, the Company recognized \$12,131 of expense. As of June 30, 2015, the warrants to purchase 100,000 shares of common stock are still outstanding.

In December 2014, the board of directors approved a grant to an employee effective January 1, 2015 to purchase 15,000 shares of common stock at a purchase price of \$0.77 per share. The options were valued at \$7,362, fair value, using the Black-Scholes Option Pricing Formula. The options expire in 10 years vesting 7,500 immediately and 7,500 in 3 months from the effective date of the option agreement. The options are expensed over the vesting terms. For the six month ending June 30, 2015, the Company recognized \$7,362 of expense. For the three month ending June 30, 2015, the Company recognized \$40 of expense. As of June 30, 2015, the options to purchase 15,000 shares of common stock are still outstanding.

In March 2015, the Company issued options to the Company's 5 independent directors to each purchase 50,000 shares of common stock at a purchase price of \$0.80 per share. The options were each valued at \$24,901, fair value, using the Black-Scholes Option Pricing Formula. The options expire in 10 years with 20,000 vesting immediately and the remainder vesting in quarterly equal installments of 10,000 commencing April 1, 2015. The options are expensed over the vesting terms. For the six month ending June 30, 2015, the Company recognized \$99,330 of expense. For the three month ending June 30, 2015, the Company recognized \$25,515 of expense. As of June 30, 2015, the options to purchase 250,000 shares of common stock are still outstanding.

In March 2015, the Company issued an option to an employee to purchase 2,500 shares of common stock at a purchase price of \$0.80 per share. The option was valued at \$1,231, fair value, using the Black-Scholes Option Pricing Formula. The option expires in 10 years vesting immediately. The option is expensed over the vesting terms. For the three and six month ending June 30, 2015, the Company recognized \$1,231 of expense. As of June 30, 2015, the options to purchase 2,500 shares of common stock are still outstanding.

In May 2015, the Company increased the authorized shares of common stock from 100,000,000 to 250,000,000.

During May 2015 through June 2015, the Company issued 2,816,199 shares of common stock and warrants to purchase 2,816,199 shares of common stock expiring five years from the date of purchase, for proceeds of \$1,915,000 in accordance to a private placement memorandum as amended on May 27, 2015. Pursuant to the terms of the offerings, up to 20 units were offered at the purchase price of \$100,000 per unit, with each unit comprised of 147,060 shares and a warrant to purchase 73,530 shares of common stock at \$0.85 per share and a warrant to purchase 73,530 shares of common stock at \$1.02 per share. The warrants to purchase 1,408,102 shares of common stock at \$0.85 per share are still outstanding as of June 30, 2015. The warrants to purchase 1,408,097 shares of common stock at \$1.02 per share are still outstanding as of June 30, 2015. Since the warrants are considered indexed to its own stock and qualify for equity classification, there is no requirement to separately account for the warrants.

**LIGHTWAVE LOGIC, INC.****NOTES TO FINANCIAL STATEMENTS****JUNE 30, 2015 AND 2014****NOTE 7 STOCK BASED COMPENSATION**

The Company uses the Black-Scholes option pricing model to calculate the grant-date fair value of an award, with the following assumptions for 2015: no dividend yield, expected volatility, based on the Company's historical volatility, 72% to 79%, risk-free interest rate 1.60% to 1.66% and expected option life of 5 to 5.1 years.

As of June 30, 2015, there was \$228,593 of unrecognized compensation expense related to non-vested market-based share awards that is expected to be recognized through May 2017.

The following tables summarize all stock option and warrant activity of the Company during the three months ended June 30, 2015:

**Non-Qualified Stock Options and Warrants Outstanding and Exercisable**

	<b>Number of Shares</b>	<b>Exercise Price</b>	<b>Weighted Average Exercise Price</b>
Outstanding, December 31, 2014	11,819,600	\$ 0.63 - \$1.75	\$ 1.15
Granted	3,183,699	\$ 0.77 - \$1.02	\$ 0.92
Expired	(487,500)	\$ 1.51	\$ 1.51
Forfeited			
Exercised			
Outstanding, June 30, 2015	14,515,799	\$ 0.63 - \$1.75	\$ 1.09
Exercisable, June 30, 2015	14,073,299	\$ 0.63 - \$1.75	\$ 1.09

The aggregate intrinsic value of options and warrants outstanding and exercisable as of June 30, 2015 was \$10,650. The aggregate intrinsic value is calculated as the difference between the exercise price of the underlying options and

warrants and the closing stock price of \$.701 for our common stock on June 30, 2015.

Range of Exercise Prices	Non-Qualified Stock Options and Warrants Outstanding Number Outstanding Currently Exercisable at June 30, 2015	Weighted Average Remaining Contractual Life	Weighted Average Exercise Price of Options and Warrants Currently Exercisable
\$0.63 - \$1.75	14,073,299	3.7 Years	\$ 1.09

**NOTE 8 RELATED PARTY**

At June 30, 2015 the Company had a legal accrual to related party of \$13,005 and travel and office expense accruals of officers in the amount of \$2,667. At December 31, 2014 the Company had a legal accrual to related party of \$8,258 and travel and office expense accruals of officers in the amount of \$2,065.

**NOTE 9 RETIREMENT PLAN**

The Company established a 401(k) retirement plan covering all eligible employees beginning November 15, 2013. There were no contributions charged to expense in 2015 and 2014.

**LIGHTWAVE LOGIC, INC.**

**NOTES TO FINANCIAL STATEMENTS**

**JUNE 30, 2015 AND 2014**

**NOTE 10 SUBSEQUENT EVENTS**

In July 2008, the Company issued options to purchase 200,000 shares of common stock at a purchase price of \$1.75 per share to members of the board of directors, under the 2007 Employee Stock Option Plan, vesting 50,000 immediately and the remaining in annual equal installments of 50,000 over the next three years. In November 2012, the options were extended to July 2015. In July 2015, an option to purchase 100,000 shares of common stock was cancelled. In July 2015, an option to purchase 100,000 shares of common stock was expired.

In August 2008, under the 2007 Employee Stock Option Plan, the Company issued options to purchase 400,000 and 1,050,000 shares of common stock at a purchase price of \$1.42 and \$1.75 per share to members of the board of directors and the Chief Executive Officer, vesting 175,000 immediately and the remaining in annual equal installments of 75,000 over the next three years and vesting in quarterly equal installments of 87,500 commencing November 1, 2008, respectively. In November 2012, the options were extended to August 2015 and July 2015, respectively. In July 2015, the options were cancelled.

In June 2010, an employee was granted with an option to purchase up to 100,000 shares of common stock at a purchase price of \$1.50 per share, vesting in equal installments of 12,500 over the next two years commencing August 1, 2010. In July 2015, the option was cancelled.

In November 2010, the board of directors approved a grant to employees of options to purchase up to 250,000 shares of common stock at a purchase price of \$1.00 per share. These options were granted on December 13, 2010, vesting 125,000 on December 13, 2010 and 125,000 vesting on June 13, 2011. In July 2015, the options were cancelled.

In November 2010, the board of directors approved a grant to three outside directors of options to purchase up to 200,000 shares of common stock at a purchase price of \$1.00 per share. These options were granted on December 13, 2010, vesting 50,000 on December 13, 2010 and the remaining in equal annual installments of 50,000 over the next three years commencing November 4, 2011. In July 2015, the options were cancelled.

During July 2015, under the 2007 Employee Stock Option Plan, the Company issued to employees and a director options to purchase 2,100,000 shares of common stock at a purchase price of \$0.70 per share. The options were valued at \$931,284, fair value, using the Black-Scholes Option Pricing Formula. The options expire in 10 years and vest immediately. The options are expensed over the vesting terms. All the options issued replaced options that either expired or were canceled as noted.

During July 2015, the Company issued a warrant to purchase 125,000 shares of common stock at a purchase price of \$0.70 per share for accounting services to be rendered over a twelve month period commencing July 1, 2015. The warrant was valued at \$55,421, fair value, using the Black-Scholes Option Pricing Formula, vesting over the next twelve months with 10,416 vesting immediately, 10,416 vesting per month on the first day of the next ten months and 10,424 vesting on the first day of the twelfth month of the corresponding service agreement. The warrant expires in five years. The expense is being recognized based on service terms of the agreement over a twelve month period.

During August 2015, under the 2007 Employee Stock Option Plan, the Company issued an option to an employee to purchase 50,000 shares of common stock at a purchase price of \$0.67 per share. The option was valued at \$19,930, fair value, using the Black-Scholes Option Pricing Formula. The option expires in 10 years and vests 12,500 immediately and the remaining in equal quarterly installments of 12,500 over the next three quarters. The option is expensed over the vesting terms.

## Item 2

### Management's Discussion and Analysis of Financial Condition and Results of Operations

#### Overview

Lightwave Logic, Inc. (the **Company**) is a development stage, electro-optical device and organic nonlinear materials company. Our primary area of expertise is the chemical synthesis of chromophore dyes used in the development of organic Application Specific Electro-Optic Polymers (ASEOP) and organic Non-Linear All-Optical Polymers (NLAOP) that have high electro-optic and optical activity. Our family of materials are thermally and photo-chemically stable, which we believe could have utility across a broad range of applications in devices that address markets such as telecommunication, data communications, high-speed computing and photovoltaic cells. Secondly, our Company is developing proprietary electro-optical and all-optical devices utilizing the advanced capabilities of our materials for applications in the fields mentioned above.

Electro-optic devices convert data from electric signals into optical signals for use in communications systems and in optical interconnects for high-speed data transfer. We expect our patented and patent-pending optical materials (chromophores), when combined with selected polymers to make ASEOP and NLAOP material systems and when completed and tested, to be the core of the future generations of optical devices, modules, sub-systems and systems that we will develop or be licensed by electro-optic device manufacturers, such as telecommunications component and systems manufacturers, networking and switching suppliers, semiconductor companies, aerospace companies and government agencies.

Our ASEOP material systems are property-engineered at the molecular level (nanotechnology level) to meet the exacting thermal, environmental and performance specifications demanded by electro-optic devices. We believe that our patented and patent pending technologies will enable us to design polymer based material systems that are free from the numerous diverse and inherent flaws that plague competitive polymer technologies employed by other companies and research groups. We engineer our polymer based material systems with the intent to have temporal, thermal, chemical and photochemical stability within our patented and patent pending molecular chromophore architectures.

Our non-linear all optical NLAOP material systems have demonstrated resonantly enhanced third-order properties approximately 2,630 times larger than fused silica, which means that they are highly photo-optically active in the absence of an RF circuit. In this way they differ from other polymer technologies and are considered more advanced next-generation materials.

Our revenue model relies substantially on the assumption that we will be able to successfully develop our polymer based material systems and photonic device products, which will use our polymer based material systems, for applications within the industries named below. When appropriate, we intend to create specific materials for each of these applications and use our proprietary knowledge base to continue to enhance its discoveries.

- Cloud computing and data centers
- Telecommunications/data communications
- Backplane optical interconnects
- Photovoltaic cells
- Medical applications
- Satellite reconnaissance
- Navigation systems
- Radar applications
- Optical filters
- Special light modulators
- All-optical switches

To be successful, we must, among other things:

- Develop and maintain collaborative relationships with strategic partners;
- Continue to expand our research and development efforts for our products;
- Develop and continue to improve on our manufacturing processes and maintain stringent quality controls;
- Produce commercial quantities of our products at commercially acceptable prices;
- Rapidly respond to technological advancements;
- Attract, retain and motivate qualified personnel; and
- Obtain and retain effective intellectual property protection for our products and technology.



We believe that Moore's Law (a principle which states the number of transistors on a silicon chip doubles approximately every eighteen months) will create markets for our high-performance electro-optic materials and photonic device products.

## **Plan of Operation**

Since inception, we have been engaged primarily in the research and development of our polymer based material systems and photonic device products. We are devoting significant resources to engineer next-generation polymer based material systems for future applications to be utilized by electro-optic device manufacturers, such as telecommunications component and systems manufacturers, networking and switching suppliers, semiconductor companies, aerospace companies, government agencies and internal device development. We expect to continue to develop products that we intend to introduce to these rapidly changing markets and to seek to identify new markets. We expect to continue to make significant operating and capital expenditures for research and development activities.

As we move from a development stage company to a product supplier, we expect that our financial condition and results of operations will undergo substantial change. In particular, we expect to record both revenue and expense from product sales, to incur increased costs for sales and marketing and to increase general and administrative expense. Accordingly, the financial condition and results of operations reflected in our historical financial statements are not expected to be indicative of our future financial condition and results of operations.

Some of our more significant milestones that we achieved during 2014-2015 include:

In January 2014 we created a new methodology to combine multiple chromophores into a single polymer host that will significantly improve their ability to generate more powerful organic, nonlinear electro-optical polymer systems. The new synthetic chemistry process can enable multiple chromophores (dyes) to work in concert with each other within a single polymer host. This proprietary process has created two new material systems, which have demonstrated outstanding electro-optic values. In addition, we now have a significant amount of data on the thermal aging of our materials. We have recently demonstrated that our materials can withstand more than 2,000 hours at 110 degrees C with little to no change in electro-optic activity in our materials, which is a significant milestone. To our knowledge, this is something that has not been achieved before in any polymer. We are also concurrently coating prototype waveguides with our proprietary material system.

In February 2014 we received our first purchase order for our advanced organic nonlinear electro-optic polymer from Boulder Nonlinear Systems (BNS) of Boulder, Colorado in connection with the development of a next generation LADAR system. A LADAR system is a radar system that utilizes a pulse laser to calculate the distance to a target, but

is also capable of rendering a 3-D image. In the event BNS continues to move forward with the development of this LADAR system, we expect to receive additional purchase orders from BNS.

In March 2014 we began the process of manufacturing an advanced design Silicon Organic Hybrid Transceiver prototype and we released the completed chip design to the OpSIS Center at the University of Delaware who produced initial silicon chips, which were delivered to us in December 2014 and January 2015. We are currently qualifying and testing these chips for utilization in our Silicon Organic Transceiver. The initial application will target inter-data center interconnections of more than 10 kilometers. Our next design will utilize a different frequency and address the current bottleneck in the rack-to-server layer.

In April 2014 we entered into a sole worldwide license agreement with Corning Incorporated enabling us to integrate Corning's organic electro-optical chromophores into our portfolio of electro-optic polymer materials. The agreement allows us to use the licensed patents within a defined license field that includes communications, computing, power, and power storage applications utilizing the nonlinear optical properties of their materials. As a result of obtaining this license agreement, we created a new powerful and durable nonlinear organic electro-optical material that will be used in photonic device development and is based on our new multi-chromophore approach that allows two or more chromophores to work in concert. This multi-chromophore system has achieved a 50% increase in chromophore concentration, leading to higher electro-optical activity when compared to an equivalent single chromophore system. Repeated, multi-point measurements multi-chromophore system shows approximately twice the electro-optic effect of Lithium Niobate with excellent durability.

In August 2014 the University of Colorado successfully fabricated and tested a bleached electro-optic waveguide modulator designed and fabricated through a sponsored collaborative research agreement. The results of this initial bleached waveguide modulator correlated well with previous electro-optic thin film properties. These initial results of our first in-house device are significant to our entire device program and are an important starting point for modulators that are being developed for target markets. We have multiple generations of new materials that we will soon be optimizing for this specific design.

In October 2014 we submitted an order with Reynard Corporation to produce gold-layered fused silica substrates for our bleached waveguide modulators to be coated with several of our organic electro-optical polymers, which we received in early November and performance tested throughout December. In May, 2015, we subsequently decided to eliminate this product from our commercial development plans due to its limited commercial value, low speed characteristics, difficulty to mass-produce and limited ability to integrate with existing architectures. In lieu of this development program, a commercially viable prototype ridge waveguide modulator program was started to replace the bleached waveguide development. We believe that the ridge waveguide modulator represents a viable telecom device opportunity for the Company that does not have the inherent limitations seen in bleached waveguide structures.

In May 2015 we achieved operating capability of our in-house Class 100 Clean Room where we expect to complete the development of prototype photonic devices enabled by our advanced organic electro-optic polymer material systems in a timelier manner. Additionally, the Joint Institute for Laboratory Astrophysics (JILA) certified three of our employees, which allows us access to JILA's world-class facility located at the University of Colorado, Boulder. Access to this facility provides us with better control over the quality of our development work and the speed at which it progresses.

In August 2015 we completed 2,000+ hours of thermal aging tests of several blends of materials created by our multi-chromophore process, which included lengthy exposure to high temperatures (85C and 110C). The data collected indicated minimal loss of electro-optical activity (R33) of our materials, which means that our organic polymers are expected to provide decades of operational performance. These results exceed previously published efforts for other organic polymers and are an important part of our commercialization effort as we begin to implement these material systems into advanced photonic devices for the telecom and datacom markets.

Additionally, in August 2015, we completed 500+ hours of photochemical stability testing of our material candidates by exposing them to the visible light spectrum. The data collected indicated no discernible change in the chemical structures in an oxygen free environment. This stability testing will continue until reaching 2000 hours, an accepted industry standard. This stability testing has begun to help us understand more clearly the processing and manufacturing requirements of our future commercial products, and provide us with the initial assurances to expect the same results as we move these materials into an actual photonic device structures. This, in turn, has enabled us to begin initial device testing on devices that utilize our silicon photonic chips.

Presently, we are continuing to move towards completion of our operating organic polymer-enabled waveguide modulator prototype using our new multi-chromophore material systems.

We ultimately intend to use our next-generation electro-optic polymer material systems and non-linear all-optical polymer material systems for future applications vital to the following industries. We expect to create specific materials for each of these applications as appropriate:

.  
Cloud computing and data centers

.  
Telecommunications/data communications

.  
Backplane optical interconnects

.  
Photovoltaic cells

.  
Medical applications

.  
Satellite reconnaissance

.  
Navigation systems

.  
Radar applications

.  
Optical filters

.  
Special light modulators

.  
All-optical switches



In an effort to maximize our future revenue stream from our electro-optic polymer material systems and non-linear all-optical polymer material systems, our business model anticipates that our revenue stream will be derived from one or some combination of the following: (i) technology licensing for specific product applications; (ii) joint venture relationships with significant industry leaders; or (iii) the production and direct sale of our own photonic device components. Our objective is to be a leading provider of proprietary technology and know-how in the photonic device markets. In order to meet this objective, subject to successful testing of our technology and having available financial resources, we intend to:

.  
Develop electro-optic polymer material systems and non-linear all-optical polymer material systems and photonic devices

.  
Continue to develop proprietary intellectual property

.  
Streamline our product development process

.  
Develop a comprehensive marketing plan

.  
Maintain/develop strategic relationships with government agencies, private firms, and academic institutions

.  
Continue to attract and retain high level science and technology personnel to our Company

### **Our Proprietary Products in Development**

As part of a two-pronged marketing strategy, our Company is developing several devices, which are in various stages of development that utilize our organic nonlinear optical materials.

They include:

.  
Ridge waveguide modulator

·  
Slot waveguide modulator

·  
Spatial light modulator

·  
100 - 400 Gbps telecommunications modulator

·  
200 - 400 Gbps datacomm/telecomm photonic transceiver

·  
Integrated photonic system

Additionally, we must continue to create and maintain an infrastructure, including operational and financial systems, and related internal controls, and recruit qualified personnel. Failure to do so could adversely affect our ability to support our operations.

## **Capital Requirements**

As a development stage company, we do not generate revenues. We have incurred substantial net losses since inception. We have satisfied our capital requirements since inception primarily through the issuance and sale of our common stock. On June 15, 2015, we completed a private placement of our securities where we raised \$1,915,000 in total proceeds.

## **Results of Operations**

### **Comparison of three months ended June 30, 2015 to three months ended June 30, 2014**

Revenues

Edgar Filing: Lightwave Logic, Inc. - Form 10-Q

As a development stage company, we had no revenues during the three months ended June 30, 2015 and June 30, 2014. The Company is in various stages of material and photonic device development and evaluation with potential customers and strategic partners. We expect the next revenue stream to be in product development agreements, prototype devices and sale of nonlinear optical polymer materials prior to moving into production.



## Operating Expenses

Our operating expenses were \$1,052,338 and \$1,011,371 for the three months ended June 30, 2015 and 2014, respectively, for an increase of \$40,967. This increase in operating expenses was due primarily to increases in investor relation expenses, laboratory electro-optic device prototype, development and outsourced testing expenses, laboratory materials and supplies, research and development medical insurance expenses, research and development rent and utility expenses, annual shareholder meeting expense, general and administration salaries and wages, research and development depreciation, research and development office expenses, research and development professional fees and research and development travel expenses offset by decreases in non-cash amortization of options and warrants, legal and general and administration office expenses.

Included in our operating expenses for the three months ended June 30, 2015 was \$619,492 for research and development expenses compared to \$618,454 for the three months ended June 30, 2014, for an increase of \$1,038.

This is primarily due to increases in laboratory electro-optic devices prototype, development and outsourced testing expenses, laboratory materials and supplies, medical insurance expenses, rent and utilities, depreciation, office expense, professional fees and travel expenses offset by a decrease in research and development non-cash stock option and warrant amortization.

Research and development expenses currently consist primarily of compensation for employees engaged in internal research, product and application development activities; laboratory operations, internal and outsourced material and device testing and prototype electro-optic device design, development and processing work; costs; and related operating expenses.

We expect to continue to incur substantial research and development expense to develop and commercialize our electro-optic material platform. These expenses will increase as a result of accelerated development effort to support commercialization of our non-linear optical polymer materials technology; outsourcing work to build device prototypes in our in-house laboratories; hiring additional technical and support personnel; engaging a senior technical advisor; pursuing other potential business opportunities and collaborations; customer testing and evaluation; and incurring related operating expenses.

Laboratory materials and supplies increased \$21,724 to \$69,990 for the three months ended June 30, 2015 from \$48,266 for the three months ended June 30, 2014. Laboratory material testing expense and electro-optic device development also increased \$11,298, from \$71,931 for the three months ended June 30, 2014 to \$83,229 for the three months ended June 30, 2015.

Edgar Filing: Lightwave Logic, Inc. - Form 10-Q

Research and development non-cash stock option amortization decreased \$68,051 from \$137,786 for the three months ended June 30, 2014 to \$69,735 for the three months ended June 30, 2015.

Rent and utility expenses increased \$13,309 from \$20,748 for the three months ended June 30, 2014 to \$34,057 for the three months ended June 30, 2015.

Medial insurance benefits increased \$10,359 from \$13,350 for the three months ended June 30, 2014 to \$23,709 for the three months ended June 30, 2015.

Depreciation increased \$3,363 from \$32,399 for the three months ended June 30, 2014 to \$35,762 for the three months ended June 30, 2015.

Office expense increased \$4,089 from \$3,013 for the three months ended June 30, 2014 to \$7,102 for the three months ended June 30, 2015.

Professional fees increased \$2,059 from \$20,915 for the three months ended June 30, 2014 to \$22,974 for the three months ended June 30, 2015.

Travel expenses increased \$2,619 from \$22,205 for the three months ended June 30, 2014 to \$24,824 for the three months ended June 30, 2015.

General and administrative expense consists primarily of compensation and support costs for management staff, and for other general and administrative costs, including executive, sales and marketing, investor relations, accounting and finance, legal, consulting and other operating expenses.

General and administrative expenses increased \$39,929 to \$432,846 for the three months ended June 30, 2015 compared to \$392,917 for the three months ended June 30, 2014. The increase is due primarily to increases in annual shareholder meeting expense, investor relations expenses, and salaries and wages offset by decreases in general and administrative non-cash amortization of options and warrants, legal and office expenses.

Shareholder annual meeting expenses increased \$42,308 to \$42,308 for the three months ending June 30, 2015 from \$0 for the three months ended June 30, 2014 since the shareholder meeting was held later during 2014.

Investor relations expenses increased by \$40,159 from \$2,871 for the three months ended June 30, 2014 to \$43,030 for the three months ended June 30, 2015.

Salaries and wages increased by \$12,970 from \$113,324 for the three months ended June 30, 2014 to \$126,294 for the three months ended June 30, 2015.

Legal expenses decreased by \$22,288 from \$74,450 for the three months ended June 30, 2014 to \$52,162 for the three months ended June 30, 2015.

Office expenses decreased \$8,540 to \$7,241 for the three months ending June 30, 2015 from \$15,781 for the three months ended June 30, 2014.

General and administrative non-cash stock option amortization decreased \$22,460 from \$58,945 for the three months ended June 30, 2014 to \$36,485 for the three months ended June 30, 2015.

We expect general and administrative expense to increase in future periods as we increase the level of corporate and administrative activity, including increases associated with our operation as a public company; and significantly increase expenditures related to the future production and sales of our products.

Net Loss

Net loss was \$1,052,276 and \$1,011,309 for the three months ended June 30, 2015 and 2014, respectively, for an increase of \$40,967, was primarily due to increases in investor relation expenses, laboratory electro-optic device prototype, development and outsourced testing expenses, laboratory materials and supplies, research and development medical insurance expenses, research and development rent and utility expenses, annual shareholder meeting expense, general and administration salaries and wages, research and development depreciation, research and development office expenses, research and development professional fees and research and development travel expenses offset by decreases in non-cash amortization of options and warrants, legal and general and administration office expenses.

#### **Comparison of six months ended June 30, 2015 to six months ended June 30, 2014**

##### Revenues

As a development stage company, we had revenues of \$0 during for the six months ended June 30, 2015 and \$2,500 for the six months ended June 30, 2014. The Company is in various stages of material and photonic device development and evaluation with potential customers and strategic partners. We expect the next revenue stream to be in product development agreements, prototype devices and sale of nonlinear optical polymer materials prior to moving into production.

##### Operating Expenses

Our operating expenses were \$2,117,790 and \$1,998,973 for the six months ended June 30, 2015 and 2014, respectively, for an increase of \$118,817. This increase in operating expenses was due primarily to increases in salaries and wages, laboratory electro-optic device prototype, development and outsourced testing expenses, laboratory materials and supplies, research and development consulting expenses, research and development medical insurance expenses, research and development depreciation, shareholder meeting expenses, investor relations expenses and research and development rent and utility expenses offset by a decrease in non-cash amortization of options and warrants, legal expenses and general and administrative office expenses.

Included in our operating expenses for the six months ended June 30, 2015 was \$1,264,698 for research and development expenses compared to \$1,203,892 for the six months ended June 30, 2014, for an increase of \$60,806. This is primarily due to increases in research and development salaries and wages, laboratory electro-optic devices prototype, development and outsourced testing expenses, laboratory materials and supplies, consulting expense, rent and utilities, medical insurance expenses and depreciation offset by decrease in research and development non-cash stock option and warrant amortization.

Research and development expenses currently consist primarily of compensation for employees engaged in internal research, product and application development activities; laboratory operations, internal and outsourced material and device testing and prototype electro-optic device design, development and processing work; costs; and related operating expenses.

We expect to continue to incur substantial research and development expense to develop and commercialize our electro-optic material platform. These expenses will increase as a result of accelerated development effort to support commercialization of our non-linear optical polymer materials technology; outsourcing work to build device prototypes in our in-house laboratories; hiring additional technical and support personnel; engaging a senior technical advisor; pursuing other potential business opportunities and collaborations; customer testing and evaluation; and incurring related operating expenses.

Laboratory materials and supplies increased \$40,851 from \$71,162 for the year ended June 30, 2014 to \$112,013 for the six months ended June 30, 2015. Laboratory material testing expense and electro-optic device development also increased \$26,401 from \$170,477 for the year ended June 30, 2014 to \$196,878 for the six months ended June 30, 2015.

Salaries and wages increased \$29,359 from \$448,084 for the six months ended June 30, 2014 to \$477,443 for the six months ended June 30, 2015.

Stock compensation and stock option amortization decreased \$108,934 from \$282,237 for the six months ended June 30, 2014 to \$173,303 for the six months ended June 30, 2015.

Rent and utility expenses increased \$25,275 from \$40,440 for the six months ended June 30, 2014 to \$65,715 for the six months ended June 30, 2015.

Edgar Filing: Lightwave Logic, Inc. - Form 10-Q

Consulting expenses increased \$18,868 from \$26,699 for the six months ended June 30, 2014 to \$45,567 for the six months ended June 30, 2015.

Medial insurance benefits increased \$18,016 from \$23,327 for the six months ended June 30, 2014 to \$41,343 for the six months ended June 30, 2015.

Depreciation expense increased \$8,597 from \$62,015 for the six months ended June 30, 2014 to \$70,612 for the six months ended June 30, 2015.

General and administrative expense consists primarily of compensation and support costs for management staff, and for other general and administrative costs, including executive, sales and marketing, investor relations, accounting and finance, legal, consulting and other operating expenses.

General and administrative expenses increased \$58,011 to \$853,092 for the six months ended June 30, 2015 compared to \$795,081 for the six months ended June 30, 2014. The increase is due primarily to increases in investor relations expenses, salaries and wages, and shareholder meeting expenses offset by a decrease in general and administrative non-cash amortization of options and warrants, legal expenses and office expenses.

Investor relations expenses increased by \$49,184 from \$25,032 for the six months ended June 30, 2014 to \$74,216 for the six months ended June 30, 2015.

Salary and wages increased \$23,896 to \$252,886 for the six months ended June 30, 2015 from \$228,990 for the six months ended June 30, 2014.

Included in the results of operations for the six months ended June 30, 2015 are expenses totaling \$42,308 for the Company's annual stockholder meeting. The annual stockholder meeting expenses for the six months ended June 30, 2014 were \$0 since the annual meeting was held later in the year during 2014.

Stock compensation and stock option amortization decreased \$31,791 from \$135,653 for the six months ended June 30, 2014 to \$103,862 for the six months ended June 30, 2015.

Legal expenses decreased \$11,023 from \$106,728 for the six months ended June 30, 2014 to \$95,705 for the six months ended June 30, 2015.

Office expenses decreased \$12,156 from \$24,049 for the six months ended June 30, 2014 to \$11,893 for the six months ended June 30, 2015.

We expect general and administrative expense to increase in future periods as we increase the level of corporate and administrative activity, including increases associated with our operation as a public company; and significantly increase expenditures related to the future production and sales of our products.

#### Net Loss

Net loss was \$2,117,667 and \$1,999,091 for the six months ended June 30, 2015 and 2014, respectively, for an increase of \$118,576, primarily due to increases in salaries and wages, laboratory electro-optic device prototype, development and outsourced testing expenses, laboratory materials and supplies, research and development consulting expenses, research and development medical insurance expenses, research and development depreciation, shareholder meeting expenses, investor relations expenses and research and development rent and utility expenses offset by a decrease in non-cash amortization of options and warrants, legal expenses and general and administrative office expenses.

#### Significant Accounting Policies

Our discussion and analysis of our financial condition and results of operations are based on our financial statements, which have been prepared in accordance with accounting principles generally accepted in the United States. The preparation of these financial statements requires us to make estimates and judgments that affect the reported amounts of assets, liabilities, revenues and expenses, and related disclosure of contingent assets and liabilities. On an ongoing basis, we evaluate our estimates based upon historical experience and various other assumptions that we believe to be reasonable under the circumstances, the results of which form the basis for making judgments about the carrying values of assets and liabilities that are not readily apparent from other sources. Our actual results may differ materially from these estimates.

We believe our significant accounting policies affect our more significant estimates and judgments used in the preparation of our financial statements. Our Annual Report on Form 10-K for the year ended December 31, 2014 contains a discussion of these significant accounting policies. There have been no significant changes in our significant accounting policies since December 31, 2014. See our Note 1 in our unaudited financial statements for the six months ended June 30, 2015, as set forth herein for a complete discussion of our Company's accounting policies.

### **Liquidity and Capital Resources**

During the six months ended June 30, 2015, net cash used in operating activities was \$1,929,241 and net cash used in investing activities was \$231,347, which was due primarily to the Company's research and development activities and general and administrative expenditures. Net cash provided by financing activities for the six months ended June 30, 2015 was \$1,915,000. At June 30, 2015, our cash and cash equivalents totaled \$2,920,352, our assets totaled \$4,322,425, our liabilities totaled \$149,769, and we had stockholders' equity of \$4,172,656.

### **Sources and Uses of Cash**

Our future expenditures and capital requirements will depend on numerous factors, including: the progress of our research and development efforts; the rate at which we can, directly or through arrangements with original equipment manufacturers, introduce and sell products incorporating our polymer materials technology; the costs of filing, prosecuting, defending and enforcing any patent claims and other intellectual property rights; market acceptance of our products and competing technological developments; and our ability to establish cooperative development, joint venture and licensing arrangements. We expect that we will incur approximately \$3,484,000 of expenditures over the next 12 months. Our cash requirements are expected to increase at a rate consistent with the Company's path to revenue growth as we expand our activities and operations with the objective of commercializing our electro-optic polymer technology during 2016.



Our business does not presently generate the cash needed to finance our current and anticipated operations. We believe we have raised sufficient capital to finance our operations through April 2016; however, we will need to obtain additional future financing after that time to finance our operations until such time that we can conduct profitable revenue-generating activities. Such future sources of financing may include cash from equity offerings, exercise of stock options, warrants and proceeds from debt instruments; but we cannot assure you that such equity or borrowings will be available or, if available, will be at rates or prices acceptable to us.

In June 2013 we signed a stock purchase agreement with Lincoln Park to sell up to \$20 million of common stock whereby subject to certain conditions and at our sole discretion, Lincoln Park has committed to purchase up to \$20 million of our common stock over a 30-month period. We registered for resale by Lincoln Park 10,000,000 shares of our common stock in October 2013. Pursuant to the stock purchase agreement, Lincoln Park is obligated to make purchases as the Company directs in accordance with the purchase agreement, which may be terminated by the Company at any time, without cost or penalty. Sales of shares will be made in specified amounts and at prices that are based upon the market prices of our Company's common stock immediately preceding the sales to Lincoln Park. We expect this financing to provide our Company with sufficient funds to maintain its operations for the foreseeable future. With the additional capital, we expect to achieve a level of revenues attractive enough to fulfill our development activities and adequate enough to support our business model for the foreseeable future. We cannot assure you that we will meet the conditions of the stock purchase agreement with Lincoln Park in order to obligate Lincoln Park to purchase our shares of common stock. In the event we fail to do so, and other adequate funds are not available to satisfy either short-term or long-term capital requirements, or if planned revenues are not generated, we may be required to substantially limit our operations. This limitation of operations may include reductions in capital expenditures and reductions in staff and discretionary costs.

There are no trading volume requirements or restrictions under the new stock purchase agreement, and we will control the timing and amount of any sales of our common stock to Lincoln Park. Lincoln Park has no right to require any sales by us, but is obligated to make purchases from us as we direct in accordance with the purchase agreement. We can also accelerate the amount of common stock to be purchased under certain circumstances. There are no limitations on use of proceeds, financial or business covenants, restrictions on future funding, rights of first refusal, participation rights, penalties or liquidated damages in the purchase agreement. We may terminate the stock purchase agreement at any time, at our discretion, without any penalty or cost to us. Lincoln Park may not assign or transfer its rights and obligations under stock the purchase agreement.

We expect that our cash used in operations will increase during 2015 and beyond as a result of the following planned activities:

.

Addition of management, sales, marketing, technical and other staff to our workforce;

Increased spending for the expansion of our research and development efforts, including purchases of additional laboratory and production equipment;

Increased spending in marketing as our products are introduced into the marketplace;

Developing and maintaining collaborative relationships with strategic partners;

Developing and improving our manufacturing processes and quality controls; and

Increases in our general and administrative activities related to our operations as a reporting public company and related corporate compliance requirements.

### **Analysis of Cash Flows**

For the six months ended June 30, 2015

Net cash used in operating activities was \$1,929,241 for the six months ended June 30, 2015, primarily attributable to the net loss of \$2,117,667 adjusted by \$55,654 in warrants issued for services, \$221,511 in options issued for services, \$40,576 in common stock issued for services, \$81,584 in depreciation expenses and patent amortization expenses, (\$138,827) in prepaid expenses and (\$72,072) in accounts payable and accrued expenses. Net cash used in operating activities consisted of payments for research and development, legal, professional and consulting expenses, rent and other expenditures necessary to develop our business infrastructure.

Net cash used by investing activities was \$231,347 for the six months ended June 30, 2015, consisting of \$10,250 in cost for intangibles and \$221,097 in asset additions primarily for the new lab facility.

Net cash provided by financing activities was \$1,915,000 for the six months ended June 30, 2015 and consisted of \$1,915,000 proceeds from a private placement of securities.



## **Inflation and Seasonality**

We do not believe that our operations are significantly impacted by inflation. Our business is not seasonal in nature.

## **Item 4**

### **Controls and Procedures**

*Evaluation of Disclosure Controls and Procedures.* The Company's management, with the participation of the Company's Principal Executive Officer and Principal Financial Officer, evaluated the effectiveness of the Company's disclosure controls and procedures (as defined in Rules 13a-15(e) and 15d-15(e) under the Securities Exchange Act of 1934, as amended) as of June 30, 2015. Based on this evaluation, the Company's Principal Executive Officer and Principal Financial Officer concluded that, as of June 30, 2015 the Company's disclosure controls and procedures were effective, in that they provide reasonable assurance that information required to be disclosed by the Company in the reports that it files or submits under the Securities Exchange Act of 1934, as amended, is recorded, processed, summarized and reported within the time periods specified in the Securities and Exchange Commission's rules and forms, and is accumulated and communicated to the Company's management, including the Company's Principal Executive Officer and Principal Financial Officer, as appropriate to allow timely decisions regarding required disclosure.

*Changes in Internal Control Over Financial Reporting.* There were no changes in our internal control over financial reporting during the quarter ended June 30, 2015 that have materially affected, or are reasonably likely to materially affect, our internal control over financial reporting.

**PART II OTHER INFORMATION**

**Item 2**

**Unregistered Sales of Equity Securities and Use of Proceeds**

<b>Date</b>	<b>Security/Value</b>
April 2015	Common Stock 2,295 shares of common stock at \$0.87 per share issued for services.
April 2015	Common Stock 6,250 shares of common stock at \$0.87 per share issued for services.
May 2015	Common Stock 2,329 shares of common stock at \$0.86 per share issued for services.
May 2015	Common Stock 6,250 shares of common stock at \$0.79 per share issued for services.
May-June 2015	Units 2,816,199 shares of common stock and warrants to purchase 2,816,199 shares of common stock contained in units for total proceeds of \$1,915,000.
June 2015	Common Stock 6,250 shares of common stock at \$0.79 per share issued for services.

No underwriters were utilized and no commissions or fees were paid with respect to any of the above transactions. We relied on Section 4(a)(2) and/or Regulation D of the Securities Act of 1933, as amended, since the transactions did not involve any public offering.

**Item 5**

**Other Information**

On August 10, 2015, the Company entered into a new employee agreement with James S. Marcelli, the Company's President and Chief Operating Officer. The employee agreement has an effective date of August 1, 2015, with a term of 24 months. It provides for, among other things, a monthly salary of 18,750 and a grant of 50,000 options at \$.67 per share that vest quarterly over the next year. The description of this employee agreement is not complete, and is qualified in its entirety by reference to the employee agreement attached hereto as Exhibit 10.1, which is incorporated by reference herein.

**Item 6**

**Exhibits**

The following exhibits are included herein:

<b>Exhibit No.</b>	<b>Description of Exhibit</b>	<b>Location</b>
3.1	Articles of Incorporation	Incorporated by reference to Company's Form 10-SB as filed with the SEC on April 13, 2007
3.2	Certificate of Amendment to Articles of Incorporation	Incorporated by reference to Company's Definitive Schedule 14C Information Statement as filed with the SEC on February 19, 2008
3.3	Certificate of Amendment to Articles of Incorporation filed June 8, 2015	Incorporated by reference to Company's Form S-1 Registration Statement as filed with the SEC on August 3, 2015
10.1	Employee Agreement - James Marcelli.	Filed herewith
10.2	Form of June 15, 2015 Subscription Agreement	Incorporated by reference to the Company's Form 8-K as filed with the SEC on June 15, 2015
10.3	Form of June 15, 2015 Warrant	Incorporated by reference to the Company's Form 8-K as filed with the SEC on June 15, 2015
31.1	Certification pursuant to Rule 13a-14(a) of the Securities Exchange Act of 1934, as amended, executed by the Principal Executive Officer of the Company.	Filed herewith
31.2	Certification pursuant to Rule 13a-14(a) of the Securities Exchange Act of 1934, as amended, executed by the Principal Financial Officer of the Company.	Filed herewith

<b>Exhibit No.</b>	<b>Description of Exhibit</b>	<b>Location</b>
32.1	Certification pursuant to 18 U.S.C. Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002, executed by the Principal Executive Officer of the Company.	Filed herewith
32.2	Certification pursuant to 18 U.S.C. Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002, executed by the Principal Financial Officer of the Company.	Filed herewith
101	XBRL	

**SIGNATURES**

Pursuant to the requirements of the Securities Exchange Act of 1934, the registrant has duly caused this report to be signed on its behalf by the undersigned thereunto duly authorized.

**LIGHTWAVE LOGIC, INC.**

Registrant

By: /s/ Thomas E. Zelibor  
Thomas E. Zelibor,  
Chief Executive Officer  
(Principal Executive Officer)

Date: August 12, 2015

By: /s/ James S. Marcelli  
James S. Marcelli,  
President, Chief Operating Officer  
(Principal Financial Officer)

Date: August 12, 2015



