

LIGHTBRIDGE Corp  
Form 10-Q  
November 10, 2016

**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: **September 30, 2016**

**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: **001-34487**

**LIGHTBRIDGE CORPORATION**

(Exact name of registrant as specified in its charter)

**Nevada**  
(State or other jurisdiction of incorporation  
or organization)

**91-1975651**  
(I.R.S. Empl. Ident. No.)

**11710 Plaza America Drive, Suite 2000**  
**Reston, VA 20190**  
*(Address of principal executive offices, Zip Code)*

**(571) 730-1200**  
*(Registrant's telephone number, including area code)*

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*(Former Name, Former Address and Former Fiscal Year if Changed Since Last Report)*

Indicate by check mark whether the registrant (1) has filed all reports required to be filed by Section 13 or 15(d) of the Exchange Act during the past 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 Web site, 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.

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

(Do not check if a smaller reporting company)

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 outstanding of the issuer's common stock, as of November 10, 2016 is as follows:

| <b>Class of Securities</b>      | <b>Shares Outstanding</b> |
|---------------------------------|---------------------------|
| Common Stock, \$0.001 par value | 5,545,150                 |



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**PART I—FINANCIAL INFORMATION****Lightbridge Corporation****Unaudited Condensed Consolidated Balance Sheets**

|   | <b>September 30,<br/>2016</b> | <b>December 31,<br/>2015</b> |
|---|-------------------------------|------------------------------|
| <b>ASSETS</b>   |                               |                              |
| <b>Current Assets</b>   |                               |                              |
| Cash and cash equivalents   | \$ 3,214,065                  | \$ 623,184                   |
| Restricted cash   | 113,990                       | 325,832                      |
| Accounts receivable - project revenue and reimbursable project costs  | 83,219                        | 139,797                      |
| Prepaid expenses and other current assets   | 135,222                       | 168,029                      |
| Deferred financing cost, net  | 491,168                       | -                            |
| <b>Total Current Assets</b>   | <b>4,037,664</b>              | <b>1,256,842</b>             |
| <b>Other Assets</b>   |                               |                              |
| Patent costs  | 1,121,771                     | 950,594                      |
| Deferred financing cost, net  | 1,105,241                     | -                            |
| <b>Total Assets</b>   | <b>\$ 6,264,676</b>           | <b>\$ 2,207,436</b>          |
| <b>LIABILITIES AND STOCKHOLDERS' EQUITY (DEFICIENCY)</b>  |                               |                              |
| <b>Current Liabilities</b>  |                               |                              |
| Accounts payable and accrued liabilities  | \$ 951,705                    | \$ 1,182,371                 |
| Note payable  | 27,377                        | -                            |
| <b>Total Current Liabilities</b>  | <b>979,082</b>                | <b>1,182,371</b>             |
| <b>Long-Term Liabilities</b>  |                               |                              |
| Deferred lease abandonment liability  | 67,354                        | 196,938                      |
| Derivative warrant liability  | 120,513                       | 2,327,195                    |
| <b>Total Liabilities</b>  | <b>1,166,949</b>              | <b>3,706,504</b>             |
| Commitments and contingencies (Note 7)  |                               |                              |
| <b>Stockholders' Equity (Deficiency)</b>  |                               |                              |
| Preferred stock, \$0.001 par value, 10,000,000 authorized shares, Convertible Series A Preferred Shares, \$.001 par value, 1,020,000 issued and outstanding at September 30, 2016 and 0 shares outstanding at December 31, 2015 | 1,020                         | -                            |
| Common stock, \$0.001 par value, 100,000,000 authorized, 5,183,231 shares outstanding at September 30, 2016 and 3,725,819 shares outstanding at December 31, 2015   | 5,183                         | 3,726                        |
| Additional paid-in capital  | 82,598,391                    | 72,868,647                   |
| Accumulated Deficit   | (77,506,867)                  | (74,371,441)                 |

|  |           |                  |           |                  |
|--|-----------|------------------|-----------|------------------|
| <b>Total Stockholders' Equity (Deficiency)</b>                 |           | 5,097,727        |           | (1,499,068)      |
| <b>Total Liabilities and Stockholders' Equity (Deficiency)</b> | <b>\$</b> | <b>6,264,676</b> | <b>\$</b> | <b>2,207,436</b> |

The accompanying notes are an integral part of these condensed consolidated financial statements

Table of Contents**Lightbridge Corporation****Unaudited Condensed Consolidated Statements of Operations**

|  | <b>Three Months Ended</b> |              | <b>Nine Months Ended</b> |                |
|--|---------------------------|--------------|--------------------------|----------------|
|  | <b>September 30,</b>      |              | <b>September 30,</b>     |                |
|  | <b>2016</b>               | <b>2015</b>  | <b>2016</b>              | <b>2015</b>    |
| Revenue:   |                           |              |                          |                |
| Consulting Revenue   | \$ 83,219                 | \$ 234,163   | \$ 372,142               | \$ 656,220     |
| Cost of Consulting Services Provided   | 43,919                    | 118,954      | 174,281                  | 452,007        |
| Gross Margin   | 39,300                    | 115,209      | 197,861                  | 204,213        |
| Operating Expenses   |                           |              |                          |                |
| General and administrative   | 1,106,125                 | 1,067,166    | 3,311,488                | 3,106,265      |
| Research and development expenses  | 441,874                   | 302,912      | 1,450,954                | 910,458        |
| Total Operating Expenses   | 1,547,999                 | 1,370,078    | 4,762,442                | 4,016,723      |
| Operating Loss   | (1,508,699)               | (1,254,869)  | (4,564,581)              | (3,812,510)    |
| Other Income and (Expenses)  |                           |              |                          |                |
| Warrant revaluation  | 78,442                    | 1,083,495    | 1,643,941                | 2,741,746      |
| Warrant modification expense   | -                         | -            | (129,369)                | -              |
| Interest income  | 19                        | 164          | 294                      | 488            |
| Financing costs  | (73,279)                  | -            | (85,650)                 | -              |
| Other expenses   | -                         | (3,061)      | (62)                     | (6,337)        |
| Total Other Income and (Expenses)  | 5,182                     | 1,080,598    | 1,429,154                | 2,735,897      |
| Net loss before income taxes   | (1,503,517)               | (174,271)    | (3,135,427)              | (1,076,613)    |
| Income taxes   | -                         | -            | -                        | -              |
| Net loss   | (1,503,517)               | (174,271)    | (3,135,427)              | (1,076,613)    |
| Accumulated preferred stock dividend   | (32,667)                  | -            | (32,667)                 | -              |
| Deemed dividend on convertible preferred stock, due to beneficial conversion feature | (581,300)                 | -            | (581,300)                | -              |
| Net loss attributable to common stockholders   | \$ (2,117,484)            | \$ (174,271) | \$ (3,749,394)           | \$ (1,076,613) |
| Net Loss Per Common Share, Basic and Diluted   | \$ (0.44)                 | \$ (0.05)    | \$ (0.91)                | \$ (0.30)      |
|  | 4,804,044                 | 3,634,030    | 4,105,107                | 3,622,393      |

Weighted Average Number of Shares  
Outstanding

The accompanying notes are an integral part of these condensed consolidated financial statements

Table of Contents**Lightbridge Corporation****Unaudited Condensed Consolidated Statements of Cash Flows**

|   | <b>Nine Months Ended<br/>September 30,</b> |                |
|---|--|----------------|
|   | <b>2016</b>                                | <b>2015</b>    |
| <b>Operating Activities:</b>  |  |                |
| Net Loss  | \$ (3,135,427)                             | \$ (1,076,613) |
| Adjustments to reconcile net loss from operations to net cash used in operating activities: |  |                |
| Stock-based compensation  | 943,424                                    | 1,017,449      |
| Amortization of deferred financing cost   | 68,590                                     | -              |
| Warrant modification expense  | 129,369                                    | -              |
| Warrant revaluation income  | (1,643,941)                                | (2,741,746)    |
| Changes in operating working capital items:   |  |                |
| Accounts receivable - fees and reimbursable project costs                                   | 56,578                                     | 214,051        |
| Prepaid expenses and other assets   | 32,807                                     | 92,615         |
| Accounts payable and accrued liabilities  | (161,359)                                  | (45,323)       |
| Deferred lease abandonment liability  | (198,891)                                  | -              |
| Net Cash Used In Operating Activities   | (3,908,850)                                | (2,539,567)    |
| <b>Investing Activities:</b>  |  |                |
| Patent costs  | (171,177)                                  | (59,627)       |
| Net Cash Used In Investing Activities   | (171,177)                                  | (59,627)       |
| <b>Financing Activities:</b>  |  |                |
| Net proceeds from the issuance of common stock  | 3,631,689                                  | 55,131         |
| Net proceeds from the issuance of preferred stock   | 2,800,000                                  | -              |
| Proceeds from the issuance of note payable  | 135,000                                    | -              |
| Repayment of note payable   | (107,623)                                  | -              |
| Restricted cash   | 211,842                                    | (489)          |
| Net Cash Provided by Financing Activities   | 6,670,908                                  | 54,642         |
| Net Increase (Decrease) In Cash and Cash Equivalents  | 2,590,881                                  | (2,544,552)    |
| Cash and Cash Equivalents, Beginning of Period  | 623,184                                    | 4,220,225      |
| Cash and Cash Equivalents, End of Period  | \$ 3,214,065                               | \$ 1,675,673   |
| <b>Supplemental Disclosure of Cash Flow Information:</b>                                    |  |                |
| Cash paid during the year:  |  |                |
| Interest paid   | 2,269                                      | -              |
| Income taxes paid   | -  | -              |
| <b>Non-Cash Financing Activity:</b>   |  |                |
| Deferred financing cost - paid with stock purchase warrants                                 | \$ 1,665,000                               | \$ -           |
| Warrant liability - reclassification to equity  | \$ 692,110                                 | \$ -           |
| Shares issued for offering costs  | \$ -                                       | \$ 275,700     |

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|  |    |         |    |   |
|--|----|---------|----|---|
| Accumulated preferred stock dividend   | \$ | 32,667  | \$ | - |
| Deemed dividend on convertible preferred stock, due to beneficial conversion feature | \$ | 581,300 | \$ | - |

The accompanying notes are an integral part of these condensed consolidated financial statements

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**LIGHTBRIDGE CORPORATION**

**NOTES TO UNAUDITED CONDENSED CONSOLIDATED FINANCIAL STATEMENTS**

**Note 1. Basis of Presentation, Summary of Significant Accounting Policies and Nature of Operations**

*Basis of presentation*

The accompanying unaudited condensed consolidated financial statements of Lightbridge Corporation and its subsidiaries have been prepared in accordance with the rules and regulations of the Securities and Exchange Commission, or the SEC, including the instructions to Form 10-Q and Regulation S-X. Certain information and note disclosures normally included in financial statements prepared in accordance with generally accepted accounting principles in the United States of America have been condensed or omitted from these statements pursuant to such rules and regulations and, accordingly, they do not include all the information and notes necessary for comprehensive consolidated financial statements and should be read in conjunction with our audited consolidated financial statements for the year ended December 31, 2015, included in our Annual Report on Form 10-K for the year ended December 31, 2015.

In the opinion of the management of the Company, all adjustments, which are of a normal recurring nature, necessary for a fair statement of the results for the three month and nine month periods have been made. Results for the interim period presented are not necessarily indicative of the results that might be expected for the entire fiscal year. When used in these notes, the terms "Company," "we," "us" or "our" mean Lightbridge Corporation and all entities included in our consolidated financial statements.

The Company was formed on October 6, 2006, when Thorium Power, Ltd. merged with Thorium Power, Inc., ("TPI"), which had been formed in the State of Delaware on January 8, 1992. On September 29, 2009, we changed our name from Thorium Power, Ltd. to Lightbridge Corporation (subsequently referred to as "we" or the "Company"). We are engaged in two operating business segments: our Technology Business Segment and our Consulting Business Segment (see Note 11-Business Segment Results).

*Liquidity*

We have incurred recurring losses since inception and expect to continue to incur losses as a result of costs and expenses related to our research and continued development of our nuclear fuel and our corporate general and

administrative expenses. Our limited capital resources and operations to date have been funded through sales of our equity securities and through revenues from our consulting business. As of September 30, 2016, we had working capital of approximately \$3.1 million, cash and restricted cash of approximately \$3.3 million, stockholders' equity of approximately \$5.1 million and an accumulated deficit of approximately \$77.5 million. As of December 31, 2015, we had working capital of approximately \$0.1 million, cash and restricted cash of approximately \$0.9 million, stockholders' deficit of approximately \$1.5 million and an accumulated deficit of approximately \$74 million. On August 2, 2016, we closed on our offering of \$2.8 million of our Convertible Series A Preferred Stock (see note 10). We have also raised approximately \$3.6 million in 2016 from our equity line purchase agreement from Aspire Capital Fund, LLC ("Aspire Capital") (see note 10). We have also entered into an option agreement with Aspire Capital that will give us an option until December 31, 2019 to enter in two equity line agreements for a combined total of \$20 million (see note 10).

In the event that we are unable to generate sufficient cash from our operating activities or raise additional funds, we may be required to delay, reduce or severely curtail our operations or otherwise impede our on-going business efforts, which could have a material adverse effect on our business, operating results, financial condition and long-term prospects. The Company expects to seek to obtain additional funding through future equity issuances. There can be no assurance as to the availability or terms upon which such financing and capital might be available.

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***Reverse Stock Split***

Effective July 20, 2016, we conducted a one for five reverse stock-split of our issued and outstanding common stock and have retroactively adjusted our common shares outstanding, options and warrants amounts outstanding. We have presented our share data for and as of all periods presented on this basis. As a result, the number of common shares issued and outstanding at September 30, 2016 decreased from 25,916,155 shares to 5,183,231 shares. The number of common shares issued and outstanding at December 31, 2015 decreased from 18,628,957 shares to 3,725,819 shares. Our authorized capital of 500,000,000 shares of common stock and 50,000,000 shares of preferred stock, each with a par value of \$0.001, was changed to 100,000,000 shares of common stock authorized and 10,000,000 shares of preferred stock authorized with a par value of \$0.001. The par value was not adjusted as a result of the one for five reverse stock split.

***Technology Business Segment***

Our primary business segment, based on future revenue potential, is to develop and commercialize innovative, proprietary nuclear fuel designs which we expect will significantly enhance the nuclear power industry's economics due to higher power output and improve safety margins.

We are currently focusing our development efforts primarily on the metallic fuel with a power uprate of up to 10% and a 24-month operating cycle in existing Westinghouse-type four-loop pressurized water reactors. Those reactors represent the largest segment of our global target market. Our metallic fuel could also be adapted for use in other types of water-cooled commercial power reactors, such as boiling water reactors, CANDU heavy water reactors, as well as water-cooled small and modular reactors.

On January 12, 2016, we announced entry into an initial services agreement with BWXT Nuclear Energy, Inc., a wholly owned subsidiary of BWX Technologies, Inc., to evaluate the ability to fabricate and prepare a preliminary plan for fabrication of Lightbridge-designed partial length nuclear fuel samples at BWXT facilities in the United States.

On March 14, 2016, we entered into a joint development agreement ("JDA") with AREVA NP ("AREVA") to develop a joint business plan to evaluate the technical, economic, and strategic feasibility and desirability of the parties' forming one or more joint venture companies to further develop, manufacture, and commercialize the Company's metallic nuclear fuel technology. The JDA includes a statement of work whereby the Company is expected to pay a total of approximately \$141,000 toward the total cost of work to be performed as part of the Joint Evaluation Project Plan by placing a work release or purchase order with AREVA. The total amount is due and payable by the Company as follows: 40% of the total amount due upon the effective date of the signing of the JDA (paid May 4, 2016); 30% of

the total amount due upon the delivery of an intermediate report by AREVA (paid August 2, 2016) and the remaining 30% due upon the delivery of the final report to the Company.

On June 6, 2016 we announced that we received a key patent covering our metallic nuclear fuel rod design in Canada and also received our key patent in China following the notice of allowance publicly disclosed in May 2016.

On July 5, 2016 we announced that we received a Notice of Allowance for a key patent covering our metallic nuclear fuel rod design from the European Patent Office. The patent was issued in August 2016.

Lightbridge will seek patent validation in key countries in the EU region, including France, the UK, Sweden, and other key countries that already have a significant amount of nuclear generating capacity.

### ***Consulting Business Segment***

Our business model expanded with the establishment of a consulting business segment in 2007, through which we provide consulting and strategic advisory services to companies and governments planning to create or expand electricity generation capabilities using nuclear power plants. On August 1, 2008, we signed separate consulting services agreements with two government entities: Emirates Nuclear Energy Corporation (“ENEC”) formed by Abu Dhabi, one of the member Emirates of the United Arab Emirates (“UAE”), and the Federal Authority for Nuclear Regulation (“FANR”) formed by the government of the UAE. Under these two original agreements, we have provided consulting and strategic advisory services over a contract term of five years starting from June 23, 2008. The FANR contract has been extended to December 31, 2016. The FANR contract can continue to be extended upon agreement by both parties.

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**Accounting Policies and Recent Pronouncements**

***Basis of Consolidation***

These consolidated financial statements include the accounts of Lightbridge, a Nevada corporation, and our wholly-owned subsidiaries, TPI, a Delaware corporation, Lightbridge International Holding LLC, a Delaware limited liability company, and our foreign branch offices.

All significant intercompany transactions and balances have been eliminated in consolidation. We registered a branch office in the United Kingdom in 2008 called Lightbridge Advisors Limited (inactive) and we also established a branch office in Moscow, Russia, in July 2009, both of which are wholly owned by Lightbridge International Holding LLC at September 30, 2016 and December 31, 2015. We anticipate that these branch offices will be closed in 2016. Translation gains and losses for the three months and nine months ended September 30, 2016 and 2015 were not significant.

***Use of Estimates and Assumptions***

The preparation of financial statements, in conformity with accounting principles generally accepted in the United States of America, requires management to make estimates and assumptions that affect the reported amounts of assets and liabilities and disclosure of contingent assets and liabilities at the date of the financial statements, and the reported amounts of revenue and expenses during the reporting period. Actual results could differ from those estimates.

***Significant Estimates***

These accompanying consolidated financial statements include some amounts that are based on management's best estimates and judgments. The most significant estimates relate to valuation of stock grants and stock options, derivative liability for the stock purchase warrants, the valuation allowance on deferred tax assets, and various contingent liabilities. It is reasonably possible that these above-mentioned estimates and others may be adjusted as more current information becomes available, and any adjustment could be significant in future reporting periods. It is also reasonably possible that the actual grant date value of the stock options vested might have been materially different than the estimated value.

***Fair Value of Financial Instruments***

The Company's financial instruments consist principally of cash and cash equivalents, accounts receivable, accounts payable, note payable and a derivative warrant liability. The fair value of a financial instrument is the amount that would be received in an asset sale or paid to transfer a liability in an orderly transaction between unaffiliated market participants. Assets and liabilities measured at fair value are categorized based on whether the inputs are observable in the market and the degree that the inputs are observable. The categorization of financial instruments within the valuation hierarchy is based on the lowest level of input that is significant to the fair value measurement. The fair value of the derivative warrant liabilities were determined based on "Level 3" inputs. See Note 9-Warrant Liability for more information on the Level 3 inputs and valuation of the derivative warrant liability and Note 12 – Fair Value Measurements for more information on fair value measurements.

***Certain Risks, Uncertainties and Concentrations***

We are an early stage company and will likely need additional funding by way of strategic alliances, further offerings of equity securities, an offering of debt securities, or a financing through a bank in order to support the remaining research and development activities required to further enhance and complete the development of our fuel products to a commercial stage. Currently, we are working on consulting revenue opportunities with the overall goal of increasing our profitability and cash flow.

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We participate in a government-regulated industry. Our operating results are affected by a wide variety of factors including decreases in the use or public favor of nuclear power, the ability of our technology to safeguard the production of nuclear power and our ability to safeguard our patents and intellectual property from competitors. Due to these factors, we may experience substantial period-to-period fluctuations in our future operating results. Potentially, a loss of a key officer, key management, and other personnel could impair our ability to successfully execute our business strategy, particularly when these individuals have acquired specialized knowledge and skills with respect to nuclear power and our operations.

Our future operations and earnings currently depend on the results of the Company's operations outside the United States. There can be no assurance that the Company will be able to successfully continue to conduct such operations, and a failure to do so would have a material adverse effect on the Company's research and development activities, financial position, results of operations, and cash flows. Also, the success of the Company's operations will be subject to other numerous contingencies, some of which are beyond management's control. These contingencies include general and regional economic conditions, competition, changes in regulations, changes in accounting and taxation standards, inability to achieve overall long-term goals, future impairment charges and global or regional catastrophic events. Because the Company is dependent on its international operations for almost all its revenue, the Company may be subject to various additional political, economic, and other uncertainties.

Accounts receivable are typically unsecured and are primarily derived from revenues earned from customers located in the Middle East. We perform ongoing evaluations to determine customer credit and we limit the amount of credit we extend, but generally we do not require collateral from our customers. We maintain reserves for estimated credit losses if necessary, however, no reserve has been set up at September 30, 2016 and December 31, 2015, as we expect to collect all of our outstanding receivables. Accounts receivable from one customer constituted approximately 100% of the total accounts receivable at September 30, 2016 and accounts receivable from two customers constituted approximately 77% of the total accounts receivable at December 31, 2015.

Approximately 0% and 17% of the total revenues reported for the three months and nine months ended September 30, 2016 and 2015, respectively, were from the ENEC and FANR contracts. Contracts with one other utility customer in the United States constituted approximately 0% and 44% of total revenues reported for the three months and nine months ended September 30, 2016, respectively, and contracts with one other customer constituted 100% and 39% for the three months and nine months ended September 30, 2015, respectively.

***Revenue Recognition***

***Consulting Business Segment***

At the present time, we derive all of our revenue from our consulting business segment on a time and expense basis as provided, by offering consulting services to utilities as well as to governments outside the United States planning to create or expand electricity generation capabilities using nuclear power plants. Our fee structure for each client engagement is dependent on a number of variables, including the size of the client, the complexity, the level of the opportunity for us to improve the client's electrical generation capabilities using nuclear power plants, and other factors. The accounting policy we use to recognize revenue depends on the terms and conditions of the specific contract.

Revenues from utilities and the Executive Affairs Authority ("EAA") of Abu Dhabi, one of the member Emirates of the UAE, and the related entities, ENEC and FANR, are billed on a time and expense basis.

We recognize revenue in accordance with ASC 605-10-S99, "Revenue Recognition." We recognize revenue when all of the following conditions are met:

- (1) There is persuasive evidence of an arrangement;
- (2) The service has been provided to the customer;
- (3) The collection of the fees is reasonably assured; and
- (4) The amount of fees to be paid by the customer is fixed or determinable.

Certain customer arrangements require evaluation of the criteria outlined in the accounting standards for reporting revenue "Gross as a Principal Versus Net as an Agent" in determining whether it is appropriate to record the gross amount of revenue and related costs, or the net amount earned as agent fees. Generally, when we are primarily obligated in a transaction, revenue is recorded on a gross basis.

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Other factors that we consider in determining whether to recognize revenue on a gross versus net basis include our assumption of credit risk, latitude in establishing prices, our determination of service specifications, and our involvement in the provision of services. We have determined, based on the credit risk that we bear for collecting consulting fees, travel costs, and other reimbursable costs from our customers, that in 2016 and 2015 we acted as a principal, and therefore we are recognizing as revenue all travel costs and other reimbursable costs billed to our customers.

Cost of consulting services includes labor, travel expenses, stock-based compensation and other related consulting costs.

***Technology Business Segment***

We are seeking to enter into a commercial arrangement with one or more fuel fabricators. We expect that our revenue from such a commercial arrangement will be recognized on a straight-line basis over the expected period of the related license term.

***Cash and Cash Equivalents and Restricted Cash***

We may at times invest our excess cash in money market mutual funds. We classify all highly liquid investments with stated maturities of three months or less from date of purchase as cash equivalents and all highly liquid investments with stated maturities of greater than three months as marketable securities. We hold cash balances in excess of the federally insured limits of \$250,000 with one prominent financial institution. We deem this credit risk not to be significant as our cash is held by a major prominent financial institution. Total cash and cash equivalents held in checking accounts, as reported on the accompanying condensed consolidated balance sheets, totaled approximately \$3.2 million and \$0.6 million at September 30, 2016 and December 31, 2015, respectively.

Restricted cash represents cash being held by the same prominent financial institution that is being used as collateral for our corporate credit cards and letters of credit to secure contingent obligations under the sub-lease and our ACH transactions. The total balance of our restricted cash at September 30, 2016 and December 31, 2015 was approximately \$0.1 million and \$0.3 million, respectively.

***Trade Accounts Receivable***

We record accounts receivable at the invoiced amount and we do not charge interest. We review the accounts receivable by amounts due from customers which are past due, to identify specific customers with known disputes or collectability issues. In determining the amount of the reserve, we make judgments about the creditworthiness of significant customers based on ongoing credit evaluations. We will also maintain a sales allowance to reserve for potential credits issued to customers. We will determine the amount of the reserve based on historical credits issued.

There was no provision for doubtful accounts or a sales allowance recorded at September 30, 2016 and December 31, 2015, as we have not experienced any bad debts from any of our customers or issued significant credits to customers.

### *Foreign Currency*

Foreign currency transaction gains/losses were not significant for the three months and nine months ended September 30, 2016 and 2015.

### *Patents and Legal Costs*

Patents are stated on the accompanying condensed consolidated balance sheets at cost. Patent costs consist primarily of legal fees and application costs for filing and pursuing patent applications. The costs of the patents, once placed in service, will be amortized on a straight-line basis over their estimated useful lives or the remaining legal lives of the patents, whichever is shorter. The amortization periods for our patents can range between 17 and 20 years if placed into service at the beginning of their legal lives. Our patents have not been placed in service for the three months and nine months ended September 30, 2016 and 2015.

Legal costs are expensed as incurred except for legal costs to file for patent protection, which are capitalized and reported as patents on the accompanying condensed consolidated balance sheets.

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***Impairment of long-lived assets***

Long-lived assets of the Company are reviewed for impairment whenever events or circumstances indicate that the carrying amount of assets may not be recoverable. The Company recognizes an impairment loss when the sum of expected undiscounted future cash flows is less than the carrying amount of the asset. The amount of impairment is measured as the difference between the asset's estimated fair value and its book value. The Company did not consider it necessary to record any impairment charges for the three months and nine months ended September 30, 2016 and 2015.

***Research, Development and Related Expenses***

These costs from our technology business segment are charged to operations in the period incurred and are shown on a separate line on the accompanying condensed consolidated statements of operations.

***Stock Warrants***

The Company accounts for stock warrants as either equity instruments or derivative liabilities depending on the specific terms of the warrant agreement. Stock warrants are accounted for as a derivative in accordance with Accounting Standards Codification 815, Derivatives and Hedging ("ASC 815") if the stock warrants contain terms that could potentially require "net cash settlement" and therefore, do not meet the scope exception for treatment as a derivative. Warrant instruments that could potentially require "net cash settlement" in the absence of express language precluding such settlement are initially classified as derivative liabilities at their estimated fair values, regardless of the likelihood that such instruments will ever be settled in cash. The Company will continue to classify the fair value of the warrants that contain "net cash settlement" as a liability until the warrants are exercised, expire or are amended in a way that would no longer require these warrants to be classified as a liability. For additional discussion of our warrants, see Note 9 - Warrant Liability.

***Commitments and Contingencies***

The Company follows subtopic 450-20 of the FASB Accounting Standards Codification to report accounting for contingencies. Certain conditions may exist as of the date the consolidated financial statements are issued, which may result in a loss to the Company but which will only be resolved when one or more future events occur or fail to occur. The Company assesses such contingent liabilities, and such assessment inherently involves an exercise of judgment.

If the assessment of a contingency indicates that it is probable that a material loss has been incurred and the amount of the liability can be estimated, then the estimated liability would be accrued in the Company's consolidated financial statements. If the assessment indicates that a potentially material loss contingency is not probable but is reasonably possible, or is probable but cannot be estimated, then the nature of the contingent liability, and an estimate of the range of possible losses, if determinable and material, would be disclosed.

Loss contingencies considered remote are generally not disclosed unless they involve guarantees, in which case the guarantees would be disclosed. The Company's legal costs associated with contingent liabilities are recorded to expense as incurred.

### ***Stock-Based Compensation***

The stock-based compensation expense incurred by Lightbridge for employees and directors in connection with its equity incentive plan is based on the employee model of ASC 718, and the fair value of the options is measured at the grant date. Under ASC 718 employee is defined as, "An individual over whom the grantor of a share-based compensation award exercises or has the right to exercise sufficient control to establish an employer-employee relationship based on common law as illustrated in case law and currently under U.S. Tax Regulations." Our advisory board members and consultants do not meet the employer-employee relationship as defined by the IRS and therefore are accounted for under ASC 505-50.

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ASC 505-50-30-11 (previously EITF 96-18) further provides that an issuer shall measure the fair value of the equity instruments in these transactions using the stock price and other measurement assumptions as of the earlier of the following dates, referred to as the measurement date:

- i. The date at which a commitment for performance by the counterparty to earn the equity instruments is reached (a performance commitment); and
- ii. The date at which the counterparty's performance is complete.

We have elected to use the Black-Scholes pricing model to determine the fair value of stock options on the measurement date of the grant. Restricted stock units are measured based on the fair values of the underlying stock on the measurement date of the grant. Shares that are issued to officers on the exercise dates of their stock options may be issued net of the minimum statutory withholding requirements to be paid by us on behalf of our employees. As a result, the actual number of shares issued will be fewer than the actual number of shares exercised under the stock option. We recognize stock-based compensation using the straight-line method over the requisite service period.

## ***Segment Reporting***

We use the "management approach" in determining reportable operating segments. The management approach considers the internal organization and reporting used by our chief decision makers for making operating decisions and assessing performance, as the source for determining our reportable segments. We have determined that we have two operating segments as defined by the FASB accounting pronouncement, "*Disclosures about Segments of an Enterprise and Related Information*". As discussed above, our two reporting business segments are our technology business and our consulting services business (see Note 11 - Business Segment Results).

## ***Recent Accounting Pronouncements***

*Stock Compensation* In March 2016, the FASB issued ASU 2016-09, Compensation – Stock Compensation (Topic 718): *Improvements to Employee Share-Based Payment Accounting*, which will simplify the income tax consequences, accounting for forfeitures and classification on the Statement of Consolidated Cash Flows. This standard is effective for fiscal years, and interim periods within those fiscal years, beginning after December 15, 2016, with early adoption permitted. This new pronouncement is not expected to have a material effect on the Company's financial position, results of operations or cash flows.

*Principal versus Agent Considerations* – In March 2016, the FASB issued Accounting Standards Update 2016-08, “Revenue from Contracts with Customers: Principal versus Agent Considerations” (“ASU 2016-08”). ASU 2016-08 clarifies implementation guidance on principal versus agent considerations in ASU 2014-09. ASU 2016-10 was issued to clarify ASC Topic 606 related to (i) identifying performance obligations; and (ii) the licensing implementation guidance. In May 2016, the FASB issued ASU 2016-12, Revenue from Contracts with Customers - Narrow-Scope Improvements and Practical Expedients, clarify certain narrow aspects of Topic 606 such as assessing the collectability criterion, presentation of sales taxes and other similar taxes collected from customers, noncash consideration, contract modifications at transition, completed contracts at transition, and technical correction. The guidance is effective for the interim and annual periods beginning on or after December 15, 2017 (early adoption is permitted but not sooner than the annual reporting periods beginning after December 15, 2016). The Company is currently assessing the impact ASU 2014-09 and ASU 2016-08 will have on the Company, but it is not expected to have a material effect on the Company’s financial position, results of operations or cash flows.

*Leases* – In February 2016, the FASB issued ASU 2016-02 which amends existing lease accounting guidance, and requires recognition of most lease arrangements on the balance sheet. The adoption of this standard will result in the Company recognizing a right-of-use asset representing its rights to use the underlying asset for the lease term with an offsetting lease liability. ASU 2016-02 will be effective for fiscal years beginning after December 15, 2018, with early adoption permitted. The Company is currently evaluating the potential impact of the adoption of this accounting pronouncement to its consolidated financial statements.

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*Deferred Taxes* – During November 2015, the FASB issued ASU 2015-17, “Balance Sheet Classification of Deferred Taxes”, which simplifies the presentation of deferred income taxes. This ASU requires that deferred tax assets and liabilities be classified on a net basis as non-current in a statement of financial position. Early adoption of this ASU did not have an effect on our deferred tax assets and deferred tax liabilities in our consolidated balance sheet as of September 30, 2016 and December 31, 2015.

*Consolidation* — In February 2015, the FASB issued ASU No. 2015-02, “Consolidation (Topic 810): Amendments to the Consolidation Analysis”. This will improve certain areas of consolidation guidance for reporting organizations that are required to evaluate whether to consolidate certain legal entities such as limited partnerships, limited liability corporations, and securitization structures. ASU 2015-02 simplified and improves generally accepted accounting principles by: eliminating the presumption that a general partner should consolidate a limited partnership, eliminating the indefinite deferral of FASB Statement No. 167, thereby reducing the number of Variable Interest Entity (VIE) consolidation models from four to two (including the limited partnership consolidation model), and clarifying when fees paid to a decision maker should be a factor to include in the consolidation of VIEs. ASU 2015-02 is effective for periods beginning after December 15, 2015. The Company has evaluated the potential impact of the adoption of this guidance on its financial statements and it currently has no impact.

*Going Concern* — In August 2014, FASB issued guidance that requires management to perform interim and annual assessments of an entity’s ability to continue as a going concern within one year of the date the financial statements are issued. An entity must provide certain disclosures if conditions or events raise substantial doubt about the entity’s ability to continue as a going concern. The updated accounting guidance will be effective for the Company on December 31, 2016, and early adoption is permitted. The Company will evaluate the going concern considerations in this guidance upon adoption.

*Revenue Recognition* — In May 2014, the FASB issued guidance on revenue from contracts with customers that will supersede most current revenue recognition guidance, including industry-specific guidance. The underlying principle is that an entity will recognize revenue to depict the transfer of goods or services to customers at an amount that the entity expects to be entitled to in exchange for those goods or services. The guidance provides a five-step analysis of transactions to determine when and how revenue is recognized. Other major provisions include capitalization of certain contract costs, consideration of time value of money in the transaction price, and allowing estimates of variable consideration to be recognized before contingencies are resolved in certain circumstances. The guidance also requires enhanced disclosures regarding the nature, amount, timing and uncertainty of revenue and cash flows arising from an entity’s contracts with customers. The guidance is effective for the interim and annual periods beginning on or after December 15, 2017 (early adoption is permitted but not sooner than the annual reporting periods beginning after December 15, 2016). The guidance permits the use of either a retrospective or cumulative effect transition method. The Company is currently evaluating the revenue recognition provisions in this guidance.

*Deferred Financing Costs - Debt Issuance Costs* – Given the absence of authoritative guidance within ASU 2015-03 for debt issuance costs related to line-of-credit arrangements, in August 2015, the FASB issued ASU 2015-15, Interest - Imputation of Interest (Subtopic 835-30), which clarifies ASU 2015-03 by stating that the SEC staff would not

object to an entity deferring and presenting debt issuance costs as an asset and subsequently amortizing the deferred debt issuance costs ratably over the term of the line-of-credit arrangement, regardless of whether there are any outstanding borrowings on the line-of-credit arrangement. This ASU is effective immediately.

The Company does not expect the adoption of any recent accounting pronouncements to have a material impact on its financial statements.

## **Note 2. Net Loss Per Share**

Basic net loss per share is computed using the weighted-average number of common shares outstanding during the period except that it does not include unvested common shares subject to repurchase or cancellation. Diluted net income per share is computed using the weighted-average number of common shares and, if dilutive, potential common shares outstanding during the period. Potential common shares consist of the incremental common shares issuable upon the exercise of stock options, warrants, restricted shares, and unvested common shares subject to repurchase or cancellation. The dilutive effect of outstanding stock options, restricted shares, restricted stock units, and warrants is not reflected in diluted earnings per share because we incurred net losses for the three months and nine months ended September 30, 2016 and 2015, and the effect of including these potential common shares in the net loss per share calculations would be anti-dilutive and are therefore not included in the calculations.

Loss per-share amounts for all periods have been retroactively adjusted to reflect the Company's 1-for-5 reverse stock split, which was effective July 20, 2016.

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**Note 3. Accounts Receivable – Project Revenue and Project Costs**

*FANR and Other Projects*

Under our agreements with FANR and other entities, revenue will be recognized on a time and expense basis and fixed contract basis. We periodically discuss our consulting work with FANR, which will review the work we perform, and our reimbursable travel expenses, and accept our monthly invoicing for services and reimbursable expenses. We expect the variation of revenue we earn from these contracts to continue.

Travel costs and other reimbursable costs under these contracts are reported in the accompanying statement of operations as both revenue and cost of consulting services provided, and were not significant for the three months and nine months ended September 30, 2016 and 2015. The total travel and other reimbursable expenses that have not been reimbursed to us and are included in total accounts receivable reported above from our consulting contracts was not significant at September 30, 2016 and December 31, 2015.

**Note 4. Prepaid Expenses and Other Current Assets**

Prepaid expenses consist primarily of prepayments made for research and development work, various professional services, insurance policies, travel, rent, and other miscellaneous prepayments. Total prepaid expenses and other current assets reported on the accompanying condensed consolidated balance sheets at September 30, 2016 and December 31, 2015, were both approximately \$0.1 and \$0.2 million, respectively.

**Note 5. Patents**

Patents represent legal fees and filing costs that are capitalized and will be amortized over their estimated useful lives of 17 to 20 years or their remaining legal lives, whichever is shorter, after they are placed in service. For the nine months ended September 30, 2016 and 2015, we capitalized approximately \$0.2 million and \$0.1 million, respectively, for patent filing costs. The total investment in patents was approximately \$1.1 million and \$1.0 million as of September 30, 2016 and December 31, 2015, respectively.

No amortization expense of patents was recorded for the three months and nine months ended September 30, 2016 and 2015. These patents were not placed in service as of September 30, 2016 and December 31, 2015, or in prior years.

**Note 6. Accounts Payable, Accrued Liabilities and Note Payable**

Accounts payable and accrued liabilities (rounded in millions) consisted of the following:

|                            | <b>September 30,<br/>2016</b> | <b>December 31,<br/>2015</b> |
|----------------------------|-------------------------------|------------------------------|
| Trade payables             | \$ 0.3                        | \$ 0.3                       |
| Accrued expenses and other | 0.5                           | 0.4                          |
| Accrued bonuses            | 0.2                           | 0.5                          |
| Total                      | \$ 1.0                        | \$ 1.2                       |

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*Note Payable*

On February 28, 2016 a note payable was issued to a finance company for a vendor invoice, which totaled \$135,000. A down payment of \$13,500 was made with remaining payments of nine monthly installments of approximately \$14,000 (annual effective interest rate approximately 5%). The note is expected to be fully paid by November 28, 2016. Total interest expense under the note was approximately \$1,000 for the three months ended September 30, 2016 and \$3,000 for the nine months ended September 30, 2016, which was recorded in the accompanying statement of operations.

**Note 7. Commitments and Contingencies**

*Operating Leases*

On December 22, 2015 we entered into a lease for new office space for a 12 month term, with a monthly rent payment of approximately \$6,500 per month plus additional charges.

On December 17, 2015 we entered into a sublease agreement for our former office space with a third party with a lease term starting January 1, 2016 to February 28, 2018. The average monthly rent to be received under this sub-lease is approximately \$15,000 per month, over the sub-lease term. At December 31, 2015 the present value of the negative cash flows over this sub-lease term was approximately \$433,000 and this amount plus a real estate commission paid to find the sub-lease tenant of approximately \$20,000, resulted in a total \$453,000 that was recognized as an abandonment loss in 2015. The long-term portion of deferred lease abandonment liability was approximately \$67,000 and the short-term portion of deferred lease abandonment liability of approximately \$167,000 was included in accounts payable and accrued liabilities at September 30, 2016. The long-term portion of deferred lease abandonment liability was approximately \$197,000 and the short-term portion of deferred lease abandonment liability of \$237,000 was included in accounts payable and accrued liabilities at December 31, 2015. We have a standard indemnification arrangement under this sublease agreement that require us to indemnify the sublessee against liabilities and claims incurred in connection with the premises covered by the Company's lease. The term of this indemnification agreement is from the time of execution of the agreement to its expiration. The maximum potential amount of future payments the Company could be required to make under these indemnification agreements is \$75,000, which is covered by a letter of credit that is outstanding as of September 30, 2016. As of September 30, 2016, the Company had not accrued a liability for this indemnification because the likelihood of incurring a payment obligation in connection with this indemnification is remote.

The future minimum lease payments required under the non-cancelable operating leases are as follows (rounded in millions):

| <b>Year ending December 31,</b> | <b>Amount</b> |
|---------------------------------|---------------|
| 2016                            | \$ 0.1        |
| 2017                            | 0.4           |
| 2018                            | 0.1           |
| Total minimum payments required | \$ 0.6        |

Minimum payments have not been reduced by minimum sublease rentals of approximately \$0.3 million due in the future under non-cancelable subleases.

#### **Note 8. Research and Development Costs**

Research and development costs, included in the accompanying condensed consolidated statement of operations amounted to approximately \$0.4 million and \$0.3 million for each of the three months ended September 30, 2016 and 2015. Research and development costs, included in the accompanying condensed consolidated statement of operations amounted to approximately \$1.5 million and \$0.9 million for the nine months ended September 30, 2016 and 2015, respectively. We shut down our Moscow office operations as of January 1, 2015 and have since shifted our research and development work primarily to the United States, Canada, Norway and France. There were no significant accrued liabilities related to the winding down of our Moscow office at September 30, 2016 and December 31, 2015.

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On March 14, 2016, we entered into a joint development agreement with AREVA which defines the different steps (including, without limitation, a feasibility study, a business plan, and an implementation action plan), working groups, and methodology to determine the feasibility and opportunity of future joint ventures between the parties. The joint development agreement provides the process by which the parties will execute definitive documentation for the joint ventures, including a term sheet that will set forth the main terms of the definitive joint venture agreements.

On January 12, 2016, we announced entry into an initial services agreement with BWXT Nuclear Energy, Inc., a wholly owned subsidiary of BWX Technologies, Inc., to evaluate the ability to fabricate and prepare a preliminary plan for fabrication of Lightbridge-designed partial length nuclear fuel samples at BWXT facilities in the United States. This arrangement can provide us with an alternative vendor and site to Canadian Nuclear Labs (“CNL”) for fabrication of our patented next generation metallic nuclear fuel test for irradiation testing at the Halden Research Reactor.

We have consulting agreements with several consultants working on various projects for us, which total approximately \$20,000 per month.

**Note 9. Warrant Liability**

Certain warrants are recorded as liabilities at their estimated fair value at the date of issuance, with the subsequent changes in estimated fair value recorded in other income (expense) in the Company’s condensed consolidated statement of operations in each subsequent quarterly period. The change in the estimated fair value of our warrant liability for the three months ended September 30, 2016 and 2015 resulted in non-cash income of approximately \$0.1 million and \$1.1 million, respectively. The change in the estimated fair value of our warrant liability for the nine months ended September 30, 2016 and 2015 resulted in non-cash income of approximately \$1.6 million and \$2.7 million, respectively. The Company utilizes the Monte Carlo simulation valuation method to value the liability classified warrants.

On June 30, 2016 we came to agreement with the 2014 warrant holders that in return for reducing the strike price of the warrants from \$11.55 per share to \$6.25 per share, the warrant holders would amend certain provisions of the warrant agreement. The revised warrants are classified as equity in the condensed consolidated financial statements. The loss on the modification of these outstanding warrants was approximately \$0.1 million and this loss was reported in other expenses. The value of the 2014 warrants at the time of the warrant modification was approximately \$0.6 million. The valuation of the amended 2014 warrants was approximately the same under both the Black Scholes pricing model and Monte Carlo valuation method.

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The estimated fair value of the liability classified warrants is determined using Level 3 inputs. Inherent in the Monte Carlo valuation model are assumptions related to expected stock-price volatility, expected life, risk-free interest rate and dividend yield. The Company estimates the volatility of its common stock based on historical volatility that matches the expected remaining life of the warrants. The risk-free interest rate is based on the U.S. Treasury zero-coupon yield curve on the grant date for a maturity similar to the expected remaining life of the warrants. The expected life of the warrants is assumed to be equivalent to their remaining contractual term. The dividend rate is based on the historical rate, which the Company anticipates to remain at zero.

The following table summarizes the calculated aggregate fair values, along with the assumptions utilized in each calculation:

|  | <b>September 30,<br/>2016</b> | <b>December 31,<br/>2015</b> |
|--|-------------------------------|------------------------------|
| Calculated aggregate value                           | \$ 120,513                    | \$ 2,327,195                 |
| Weighted average exercise price per share of warrant | \$ 27.60                      | \$ 18.60                     |
| Closing price per share of common stock              | \$ 1.74                       | \$ 5.00                      |
| Weighted average volatility                          | 93.56%                        | 83.6%                        |
| Weighted average remaining expected life (years)     | 2.77                          | 5.11                         |
| Weighted average risk-free interest rate             | 0.88                          | 1.90                         |
| Dividend yield                                       | 0%                            | 0%                           |

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The nature of the warrant liability is such (i.e., the warrant holders receive more value when the Company's stock price is higher) that increases in the Company's stock price during the period result in losses on the Company's statement of operations while decreases in the Company's stock price result in the Company recording income. The warrant liability decreased on September 30, 2016 due to the decrease in stock price and the settlement of the 2014 warrants, resulting in the 2014 warrants being treated as equity instead of a derivative liability at June 30, 2016.

**Note 10. Stockholders' Equity**

All common shares, warrants and stock option amounts and per share amounts for all periods reported below has been retroactively adjusted to reflect the Company's 1-for-5 reverse stock split, which was effective July 20, 2016.

At September 30, 2016, there were 5,183,231 common shares, 1,772,622 stock warrants and 1,451,861 stock options outstanding, all totaling 8,407,714 of total stock and stock equivalents outstanding at September 30, 2016. At December 31, 2015, there were 3,725,819 common shares, 977,355 stock warrants and 1,047,450 stock options outstanding, totaling 5,750,624 of total stock and stock equivalents outstanding at December 31, 2015.

***Securities Purchase Agreement – General International Holdings, Inc.***

On June 28, 2016, we entered into a Securities Purchase Agreement (the "GIH Offering") with General International Holdings, Inc. ("GIH") pursuant to which GIH agreed to purchase 1,020,000 shares of the Company's newly created Non-Voting Series A Convertible Preferred Stock (the "Series A Preferred Stock") for \$2.8 million or approximately \$2.75 per share, subject to the terms and conditions set forth in the GIH Offering. On August 2, 2016, the closing of the sale of the Series A Preferred Stock under the GIH Offering took place.

The initial value attributed to the Series A Preferred Stock of \$2,800,000 represents a discount of approximately \$581,300 from its initial conversion value of \$3,381,300, or approximately \$0.57 per share. The average of the high and low market prices of the common stock on August 2, 2016, the date of the closing of the sale of the preferred stock, was \$3.315 per share. The intrinsic value of the Series A Preferred Stock is \$3.315 multiplied by the 1,020,000 common shares into which the Series A Preferred Stock is convertible or \$3,381,300. Subtracting the \$2,800,000 of proceeds from the intrinsic value of Series A Preferred Stock, resulted in an intrinsic value for the beneficial conversion feature totaling \$581,300. The Company recorded this beneficial conversion feature as a deemed dividend on convertible preferred stock upon issuance, for the three months and nine months ended September 30, 2016. At the closing, Mr. Xingping Hou, the president of GIH, joined the Board of Directors of the Company as co-Chairman.

The Series A Preferred Stock is non-voting and is convertible at the option of the holder into shares of the Company's common stock initially on a one-for-one basis. Dividends accrue on the Series A Preferred Stock at the rate of 7% per year and will be paid in-kind. The accumulated dividend (unpaid) at September 30, 2016 was approximately \$33,000.

The Company has the option of forcing the conversion of the Series A Preferred Stock if the trading price for the Company's common stock is more than two times the applicable conversion price (approximately \$2.75 per share) before the third anniversary of the issuance of the Series A Preferred Stock, or if the trading price is more than three times the applicable conversion price following the third anniversary of issuance. The Company may also redeem the Series A Preferred Stock following the third anniversary of the issuance.

### *Series A Preferred Stock*

On July 29, 2016, in anticipation of the closing under the Purchase Agreement with General International Holdings, Inc., (see above) the Company filed a Certificate of Designation of Preferences, Rights and Limitations of Non-Voting Series A Convertible Preferred Stock (the "Certificate of Designation") with the Secretary of State of the State of Nevada. Pursuant to the Certificate of Designation, the Company's Board of Directors designated a new series of the Company's preferred stock, the Non-Voting Series A Convertible Preferred Stock, par value \$0.001 per share (the "Series A Preferred Stock"). The Certificate of Designation authorized the Company to issue 1,020,000 shares of Series A Preferred Stock. Each share of Series A Preferred Stock has a liquidation preference of \$2.75 per share. The holders of the Series A Preferred Stock have no voting rights. In addition, as long as 255,000 shares of Series A Preferred Stock are outstanding, the Company may not take certain actions without first having obtained the affirmative vote or waiver of the holders of a majority of the outstanding shares of Series A Preferred Stock. The Company has the option at any time after August 2, 2019 to redeem some or all of the outstanding Series A Preferred Stock for an amount in cash equal to the liquidation preference plus the amount of any accrued but unpaid dividends of the Series A Preferred Stock being redeemed. The Series A Preferred Stock is not redeemable upon the election of the holders of Series A Preferred Stock.

Table of Contents***Aspire Option Agreement***

On August 10, 2016 the Company entered into an option agreement with Aspire Capital whereby the Company has the right, at any time prior to December 31, 2019, to require Aspire Capital to enter into with the Company, up to two common stock purchase agreements each with a three year term, with an aggregate amount under both purchase agreements combined not to exceed \$20,000,000. A notice to Aspire exercising the option may be revoked by the Company at any time prior to the parties entering into a purchase agreement without effecting or limiting the Company's future rights to give a subsequent option notice to Aspire Capital, under the terms and conditions of the option agreement.

The Company issued 500,000 common stock purchase warrants with a strike price of \$0.01 per share to Aspire Capital as the commitment fee for entering into this option agreement. The commitment fee of approximately \$1.7 million was recorded as deferred financing costs and additional paid-in capital and this asset will be amortized over the life of the option agreement. The amortized amount of \$0.1 million was expensed to financing costs during the three months and nine months ended September 30, 2016. The total short-term and long-term unamortized portion is carried on the balance sheet as deferred financing cost was approximately \$1.6 million at September 30, 2016.

The assumptions used in the Black Scholes option-pricing model for the three months ended and nine months ended September 30, 2016, were as follows:

|                                 |       |
|---------------------------------|-------|
| Average risk-free interest rate | 0.83% |
| Average expected life- years    | 3.39  |
| Expected volatility             | 92.61 |
| Expected dividends              | 0%    |

The future amortization of deferred financing costs are as follows (in millions):

|      |    |     |
|------|----|-----|
| 2016 | \$ | 0.1 |
| 2017 | \$ | 0.5 |
| 2018 | \$ | 0.5 |
| 2019 | \$ | 0.5 |

***Securities Purchase Agreement - Aspire Capital***

On June 28, 2016, we entered into a Securities Purchase Agreement with Aspire Capital Fund, pursuant to which the Company has agreed to sell up to \$5.0 million of shares of the Company's common stock to Aspire Capital, without an underwriter or placement agent.

Pursuant to the Securities Purchase Agreement, the Company sold 371,400 shares of common stock and 295,267 in the form of pre-funded warrants with an exercise price of \$0.05 per share to Aspire Capital on June 28, 2016 for \$1.0 million (the "First Purchase"). The Securities Purchase Agreement provides for the sale of up to an additional \$3.0 million of the Company's common stock to Aspire Capital upon the Company's announcement on or before March 31, 2017 of its entry into a binding joint venture agreement to fully develop and to commercialize Lightbridge-designed metallic nuclear fuel with a major global nuclear fuel fabrication company. The Securities Purchase Agreement also provided for the sale of up to an additional \$1.0 million of the Company's common stock upon the Company's announcement on or before October 31, 2016 of its entry into a strategic arrangement regarding Lightbridge- designed nuclear fuel with one or more major nuclear utilities, but this milestone was not satisfied.

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The subsequent closing is subject to customary conditions, including the satisfaction of Aspire Capital with achievement of the milestone. The purchase price per share for the subsequent closing will be based upon the market price of the common stock at the time of such closing, or, if lower, \$5.00 per share. Aspire Capital may elect to receive pre-funded warrants in lieu of common stock for all or a portion of the subsequent closings. The Company did not use an underwriter or placement agent in connection with the offering and therefore owed no placement agent commissions on this offering.

The allocation of the proceeds from the offering, based on the relative fair value of the common stock and the warrants, resulted in the allocation of approximately \$0.6 million of the net proceeds to the common stock sold and approximately \$0.4 million of the net proceeds to the warrants, which was recorded to additional paid-in capital-stock.

The value of the warrants issued was calculated by using the Black Scholes Valuation Model, which was approximately the same as the Monte Carlo valuation method, using the following assumptions: volatility 91%; risk-free interest rate of 1%; dividend yield of 0%, and expected term of 5 years. The volatility of the Company's common stock was estimated by management based on the historical volatility of the trading history of the Company's common stock. The risk-free interest rate was based on the Treasury Constant Maturity Rates published by the U.S. Federal Reserve for periods applicable to the expected life of the warrants. The expected dividend yield was based on the Company's current and expected dividend policy and the expected term is equal to the contractual life of the warrants.

**Equity Purchase Agreement – Equity Line**

On September 4, 2015, we entered into a common stock purchase agreement with Aspire Capital, which provides that Aspire Capital is committed to purchase up to an aggregate of \$10.0 million of shares of our common stock over a two-year term, subject to our election to sell any such shares, and subject to the Nasdaq Listing Rule 5635(d) limitation. Nasdaq Listing Rule 5635(d) (“the Nasdaq 20% Rule”), requires shareholder approval of a transaction other than a public offering involving the sale, issuance, or potential issuance by a company of common stock (or securities convertible into or exercisable for common stock) equal to 20% or more of the company's outstanding shares of common stock, or 20% or more of the voting power outstanding before the issuance for less than the greater of book or market value of the stock. The Company held its Annual Meeting on May 12, 2016. At the 2016 Annual Meeting, the Company's stockholders voted on the approval, pursuant to Nasdaq Listing Rule 5635(d), of the issuance of up to 3.0 million additional shares of common stock to Aspire Capital. The Company would seek stockholder approval before issuing more than such 3.0 million shares.

Under the agreement, we have the right to sell shares, subject to certain volume limitations and a minimum floor price, to Aspire Capital as of January 8, 2016, the date all conditions to the commencement of sales under the common stock purchase agreement were satisfied, including the effectiveness of the Form S-1 registration statement registering the resale of the Company's common stock by Aspire Capital. On any trading day selected by the Company, the

Company will have the right, in its sole discretion, to present Aspire Capital with a purchase notice directing Aspire Capital (as principal) to purchase up to 20,000 shares of the Company's common stock per business day (in a purchase amount up to \$250,000 on each such business day) at a price equal to the lesser of:

1. The lowest sale price of the Company's common stock on the purchase date; or
2. The arithmetic average of the three (3) lowest closing sale prices for the Company's common stock during the twelve (12) consecutive trading days ending on the trading day immediately preceding the purchase date.

In addition, on any date on which we submit a purchase notice to Aspire Capital in an amount equal to 20,000 shares, the Company also has the right, in its sole discretion, to present Aspire Capital with a volume-weighted average price purchase notice (each, a "VWAP Purchase Notice") directing Aspire Capital to purchase an amount of stock equal to up to 30% of the aggregate shares of the Company's common stock traded on its principal market on the next trading day (the "VWAP Purchase Date"), subject to a maximum number of shares as the Company may determine. The purchase price per share pursuant to such VWAP Purchase Notice is generally 95% of the volume-weighted average price for the Company's common stock traded on its principal market on the VWAP Purchase Date.

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As part of the agreement, Aspire Capital received 60,000 additional shares as compensation for its commitment, valued approximately \$276,000 or \$4.60 per common share, recorded to additional paid-in capital.

For the nine months ended September 30, 2016 we sold approximately 1.1 million common shares for total gross proceeds of approximately \$2.7 million through the equity line financing arrangement with Aspire Capital that we have in place.

ATM Offering

On June 11, 2015, the Company entered into an at-the-market issuance (“ATM”) sales agreement with MLV & Co. LLC (“MLV”), pursuant to which the Company may issue and sell shares of its common stock from time to time through MLV as the Company's sales agent. On September 1, 2015, MLV was acquired by FBR & Co. The issuance and sale of shares by the Company under the sales agreement are registered shares under the Company's shelf registration statement on Form S-3, as filed with the Securities and Exchange Commission on June 11, 2015 and declared effective by the Securities and Exchange Commission. The Company registered the sale of up to \$5.8 million of common stock under the ATM sales agreement. There have been approximately 49,000 shares sold for total gross proceeds of approximately \$282,000 through the ATM for the twelve month period ended December 2015. There were no ATM sales for the nine months ended September 30, 2016.

Outstanding Warrants

|  | September 30,<br>2016 | December 31,<br>2015 |
|--|-----------------------|----------------------|
| Issued to Investors on July 28, 2010, entitling the holders to purchase 207,000 common shares in the Company at an exercise price of \$45.00 per common share up to and including July 27, 2017. These warrants are reported in the liability section of our balance sheet.  | 207,000               | 207,000              |
| Issued to Investors on October 25, 2013, entitling the holders to purchase 250,000 common shares in the Company at an exercise price of \$11.50 per common share up to and including April 24, 2021. These warrants are reported in the liability section of our balance sheet.  | 223,436               | 223,436              |
| Issued to Investors on November 17, 2014, entitling the holders to purchase 546,919 common shares in the Company at an exercise price of \$11.55 per common share up to and including May 16, 2022 - reclassified to equity on June 30, 2016, exercise price amended to \$6.25 per common share. These warrants are reported in the equity section of our balance sheet on September 30, 2016 and in | 546,919               | 546,919              |

the liability section of our balance sheet on December 31, 2015.

|  |           |         |
|--|-----------|---------|
| Issued to an Investor on June 28, 2016, entitling the holders to purchase 295,267 common shares in the Company at an exercise price of \$0.05 per common share (pre-funded) up to and including June 27, 2021. These warrants are reported in the equity section of our balance sheet. | 295,267   | -       |
| Issued to an investor on August 10, 2016, entitling the holders to purchase 500,000 common shares in the Company at an exercise price of price of \$0.01 per share, up to and including December 31, 2019. These warrants are reported in the equity section of our balance sheet.     | 500,000   | -       |
|  | 1,772,622 | 977,355 |

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**Stock-based Compensation – Stock Options and Restricted Stock**

Stock Plan

The Company held its Annual Meeting on May 12, 2016 and the stockholders voted on the approval of an amendment to the 2015 Equity Incentive Plan to increase the number of shares authorized for issuance thereunder by 800,000 shares to 1,400,000 shares.

On March 25, 2015, the Compensation Committee and Board of Directors approved the 2015 Equity Incentive Plan (the “Plan”) to authorize grants of (a) Incentive Stock Options, (b) Non-qualified Stock Options, (c) Stock Appreciation Rights, (d) Restricted Awards, (e) Performance Share Awards, and (f) Performance Compensation Awards to the employees, consultants, and directors of the Company. The Plan authorizes a total of 1,400,000 shares to be available for grant under the Plan. The Plan became effective upon ratification by the shareholders of the Company at the shareholders’ annual meeting on July 14, 2015. Other provisions are as follows:

- (i) Any shares of common stock granted in connection with Options and Stock Appreciation Rights shall be counted against this limit as one share for every one Stock Option or Stock Appreciation Right awarded. Any shares of common stock granted in connection with Awards other than Options and Stock Appreciation Rights shall be counted against this limit as two shares of common stock for every one share of common stock granted in connection with such Award;
- (ii) Subject to adjustment in accordance with the Plan as amended, no Participant shall be granted, during any one year period, Stock Options to purchase Common Stock and Stock Appreciation Rights with respect to more than three hundred thousand (300,000) shares of Common Stock in the aggregate. The Plan also separately limits other Equity Awards with respect to more than three hundred thousand (300,000) shares of Common Stock in the aggregate. If an Award is to be settled in cash, the number of shares of Common Stock on which the Award is based shall count toward the individual share limit; and
- (iii) A ten percent shareholder shall not be granted an Incentive Stock Option unless the Option exercise price is at least 110% of the fair market value of the common stock at the grant date and the option is not exercisable after the expiration of five years from the grant date.

Total stock options outstanding at September 30, 2016 and December 31, 2015, under the 2006 Stock Plan and 2015 Equity Incentive Plan were 1,451,861 and 1,047,450 of which 756,162 and 688,452 of these options were vested at September 30, 2016 and December 31, 2015, respectively. Stock based compensation was approximately \$0.4 and \$0.2 million for the three months ended September 30, 2016 and 2015, respectively. Stock based compensation was approximately \$0.9 and \$1.0 million for the nine months ended September 30, 2016 and 2015, respectively.

**2015 Short-Term Non-Qualified Option Grants**

On April 8, 2015, the Compensation Committee and the Board of Directors granted short term non-qualified stock options totaling 92,641 and 29,771 stock options under the 2006 Stock Plan and the 2015 Equity Incentive Plan, respectively, to employees and consultants of the Company. On April 9, 2015, the Compensation Committee and the Board of Directors granted an additional 9,404 and 794 stock options under the 2006 Stock Plan and the 2015 Equity Incentive Plan, respectively, all with a strike price of \$6.30. These stock options vested immediately but the grants under the 2015 Equity Incentive Plan became exercisable upon ratification of the Plan at the annual meeting of shareholders, which took place on July 14, 2015.

On August 12, 2015, the Compensation Committee and the Board of Directors granted short term non-qualified stock options totaling 27,181 stock options under the 2015 Equity Incentive Plan to employees and consultants of the Company, all with a strike price of \$6.30. These stock options vested immediately.

On November 20, 2015, the Compensation Committee and the Board of Directors granted short term non-qualified stock options totaling 225,831 stock options under the 2015 Equity Incentive Plan to employees and consultants of the Company, all with a strike price of \$4.60. These stock options vested immediately.

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Also granted under the 2006 Stock Plan were 50,213 and 2,889 non-qualified stock options in 2016 and 2015 respectively, as equity compensation in lieu of cash with strike prices ranging from \$1.74 to \$6.25. In 2015, 4,634 non-qualified stock options were granted from the 2015 Equity Incentive Plan, as equity compensation in lieu of cash with strike prices ranging from \$4.15 to \$6.25.

These stock options have an expected life of 1.5 -5 years, and a contractual term of 3-10 years, a fair value of between \$0.23 and \$4.22 per stock option, a risk free rate ranging between 0.42% to 1.76%, and volatility ranging between 76% to 94%, as measured on the grant date. The expected option term was calculated using the simplified method as we do not have sufficient historical option data to provide a better estimate of the expected option term. Under this method, the weighted-average expected life is presumed to be the average of the vesting term and the contractual term of the option, which results in a reduction of the estimated option value and consequently the stock option expense. The risk free rate was based on the US Treasury Yield for the expected life of the options on the grant date. Expected dividends are estimated at \$0.0, as we have never issued dividends and we have no current plans to issue dividends in the future.

**2015 Long-Term Incentive Option Grants**

**Employees and Consultants Option Grants**

On April 8, 2015, August 12, 2015, and November 20, 2015, the Compensation Committee and the Board of Directors granted long term incentive stock options totaling 110,199, 15,922 and 509,247 respectively, under the 2015 Equity Incentive Plan, the (“Plan”) to employees and consultants of the Company. 376,998 of the long term incentive options granted on November 20, 2015, were contingent on shareholder approval which occurred on May 12, 2016, at the annual meeting of stockholders. These stock options vest 1/3 on each annual anniversary date over three years. These stock options have a strike price ranging from \$4.60 to \$6.30 and the stock options have a fair value ranging from \$1.28 to \$4.57, based on a risk free rate of between 1.15% and 1.87%, volatility between 86% and 88%, and an expected life of nine years. The expected life is calculated using the simplified method as we do not have sufficient historical option data to provide a better estimate of the expected option term. These options have a 10 year contractual term. The risk free rate was based on the US Treasury Yield for the expected life of the options on the measurement date. Expected dividends are estimated at \$0.0, as we have never issued dividends and we have no current plans to issue dividends in the future. Grants to our consultants were re-measured as of September 30, 2016. This re-measured stock based compensation for options issued to consultants was not significant. We estimated future pre-vest forfeitures to be 1.5%, based on historical information.

**Director Option Grants**

On April 8, 2015, August 12, 2015, and November 20, 2015, the Compensation Committee and the Board of Directors granted 22,600, 4,608, and 75,468 respectively, of long term non-qualified stock options under the 2015 Equity Incentive Plan to the Board of Directors of the Company. 55,868 of the long term incentive options granted on November 20, 2015, were contingent on shareholder approval which occurred on May 12, 2016, at the annual meeting of stockholders. These stock options fully vest on the first annual anniversary date of the grant. These stock options have a strike price between \$4.60 and \$6.30, and the stock options have a fair value of between \$3.25 to \$4.41, based on a risk free rate between 1.46% and 1.79%, volatility between 86% and 87%, and an expected life of 5.5 years. The expected life is calculated using the simplified method as we do not have any history to provide a better estimate of the expected option term. These options have a 10 year contractual term. The risk free rate was based on the US Treasury Yield Curve for the expected life of the options on the grant date. Expected dividends are estimated at \$0.0, as we have never issued dividends and we have no current plans to issue dividends in the future.

Stock option transactions to the employees, directors and consultants are summarized as follows for the nine months ended September 30, 2016:

|                         | <b>Options<br/>Outstanding</b> | <b>Weighted<br/>Average<br/>Exercise<br/>Price</b> | <b>Weighted<br/>Average<br/>Grant Date<br/>Fair Value</b> |
|-------------------------|--------------------------------|--|---|
| Beginning of the period | 1,047,450                      | \$ 18.50   | \$ 20.30  |
| Granted                 | 483,079                        | 4.71   | 2.83  |
| Exercised               | -                              | -  | -   |
| Forfeited               | (78,668)                       | 101.57   | 101.02  |
| Expired                 | -                              | -  | -   |
| End of the period       | 1,451,861                      | \$ 9.41  | \$ 7.03   |
| Options exercisable     | 756,162                        | \$ 13.36   | \$ 10.31  |

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Stock option transactions to the employees, directors and consultants are summarized as follows for the year ended December 31, 2015:

|                       | <b>Options<br/>Outstanding</b> | <b>Weighted<br/>Average<br/>Exercise<br/>Price</b> | <b>Weighted<br/>Average<br/>Grant Date<br/>Fair Value</b> |
|-----------------------|--------------------------------|--|---|
| Beginning of the year | 405,344                        | \$ 45.95   | \$ 53.05  |
| Granted               | 698,323                        | 5.40   | 3.70  |
| Exercised             | -                              | -  | -   |
| Forfeited             | (22,883)                       | 33.15  | 30.30   |
| Expired               | (33,334)                       | 67.50  | 64.20   |
| End of the year       | 1,047,450                      | \$ 18.50   | \$ 20.30  |
| Options exercisable   | 688,452                        | \$ 24.75   | \$ 8.40   |

A summary of the status of the Company's non-vested options as of September 30, 2016 and December 31, 2015, and changes during the nine months ended September 30, 2016 and the year ended December 31, 2015, is presented below:

|                                 | <b>Shares</b> | <b>Weighted-<br/>Average Fair<br/>Value<br/>Grant Date</b> | <b>Weighted<br/>Average<br/>Exercise Price</b> |
|---------------------------------|---------------|--|--|
| <b>Non-vested Shares</b>        |               |  |  |
| Non-vested at January 1, 2015   | 92,467        | \$ 8.55  | \$ 12.75                                       |
| Granted                         | 698,323       | 3.70   | 5.40   |
| Vested                          | (431,789)     | 4.00   | 5.90   |
| Forfeited                       | -             | -  | -  |
| Non-vested - December 31, 2015  | 359,001       | \$ 4.55  | \$ 6.70  |
| Granted                         | 483,079       | \$ 2.83  | \$ 4.71  |
| Vested                          | (146,381)     | 3.76   | 7.27   |
| Forfeited                       | -             | -  | -  |
| Non-vested - September 30, 2016 | 695,699       | \$ 3.45  | \$ 5.12  |

As of September 30, 2016, there was approximately \$1.5 million of total unrecognized compensation cost related to non-vested share-based compensation arrangements granted under the plans. That cost is expected to be recognized over a weighted-average period of 1.86 years. There was substantially no intrinsic value for the stock options outstanding at September 30, 2016 and December 31, 2015.

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The above tables include options issued and outstanding as of September 30, 2016 and December 31, 2015, as follows:

- i) A total of 51,051 non-qualified 10 year options have been issued, and are outstanding, to advisory board members at exercise prices of \$22.50 to \$72.00 per share.
- ii) A total of 1,225,147 non-qualified 5-10 year options have been issued, and are outstanding, to our directors, officers, and employees at exercise prices of \$1.74 to \$73.50 per share. From this total, 376,769 options are outstanding to the Chief Executive Officer who is also a director, with remaining contractual lives of 1.2 years to 9.4 years. All other options issued to directors, officers, and employees have a remaining contractual life ranging from 0.01 years to 9.9 years.
- iii) A total of 175,663 non-qualified 3-10 year options have been issued, and are outstanding, to our consultants at exercise prices of \$4.04 to \$52.50 per share.

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The following table provides certain information with respect to the above-referenced stock options that are outstanding and exercisable at September 30, 2016:

| Exercise Prices | Stock Options Outstanding                   |                  |                                 | Stock Options Vested                        |                  |                                 |
|-----------------|---|------------------|---------------------------------|---|------------------|---------------------------------|
|                 | Weighted Average Remaining Contractual Life | Number of Awards | Weighted Average Exercise Price | Weighted Average Remaining Contractual Life | Number of Awards | Weighted Average Exercise Price |
|                 | -Years                                      |                  |                                 | -Years                                      |                  |                                 |
| \$1.74-\$4.50   | 6.90  | 9,993            | \$ 3.25                         | 6.90  | 9,993            | \$ 3.25                         |
| \$4.51-\$6.00   | 9.14  | 812,033          | \$ 4.60                         | 9.14  | 227,318          | \$ 4.60                         |
| \$6.01-\$20.00  | 6.75  | 451,843          | \$ 7.61                         | 6.64  | 340,849          | \$ 7.53                         |
| \$20.01-\$45.00 | 2.49  | 144,683          | \$ 31.47                        | 2.49  | 144,683          | \$ 31.47                        |
| \$45.01-\$73.50 | 0.95  | 33,309           | \$ 57.13                        | 0.95  | 33,309           | \$ 57.13                        |
| Total           | 7.53  | 1,451,861        | \$ 9.41                         | 6.35  | 756,162          | \$ 13.36                        |

The following table provides certain information with respect to the above-referenced stock options that are outstanding and exercisable at December 31, 2015:

| Exercise Prices  | Stock Options Outstanding                   |                  |                                 | Stock Options Vested                        |                  |                                 |
|------------------|---|------------------|---------------------------------|---|------------------|---------------------------------|
|                  | Weighted Average Remaining Contractual Life | Number of Awards | Weighted Average Exercise Price | Weighted Average Remaining Contractual Life | Number of Awards | Weighted Average Exercise Price |
|                  | -Years                                      |                  |                                 | -Years                                      |                  |                                 |
| \$4.15-\$6.30    | 9.70  | 698,323          | \$ 5.38                         | 9.58  | 393,145          | \$ 5.31                         |
| \$12.75-\$25.00  | 3.26  | 129,141          | \$ 15.52                        | 3.20  | 75,321           | \$ 17.50                        |
| \$25.05-\$64.50  | 3.04  | 133,648          | \$ 37.93                        | 3.04  | 133,648          | \$ 37.93                        |
| \$67.50-\$94.50  | 0.63  | 38,338           | \$ 73.77                        | 0.63  | 38,338           | \$ 73.77                        |
| \$96.00-\$119.25 | 0.12  | 48,000           | \$ 119.25                       | 0.12  | 48,000           | \$ 119.25                       |
| Total            | 7.28  | 1,047,450        | \$ 18.50                        | 6.46  | 688,452          | \$ 24.75                        |

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We use the historical volatility of our stock price over the number of years that matches the expected life of our stock option grants or we use the historical volatility of our stock price since January 5, 2006, the date we announced that we were becoming a public company, to estimate the future volatility of our stock. At this time we do not believe that there is a better objective method to predict the future volatility of our stock for options with an expected term that is greater than our stock trading history. Prior to January 1, 2015, we estimated the life of our option awards based on the full contractual term of the option grant. To date we have had very few exercises of our option grants, and those stock option exercises had occurred just before the contractual expiration dates of the option awards. Since the strike price of most of our outstanding awards is greater than the price of our stock, generally awards have expired at the end of the contractual term. For options granted after January 1, 2015, we have applied the simplified method to estimate the expected term of our option grants as it is more likely that these options may be exercised prior to the end of the term. We estimate the effect of future forfeitures of our option grants based on an analysis of historical forfeitures of unvested grants, as we have no better objective basis for that estimate. The expense that we have recognized related to our grants includes the estimate for future pre-vest forfeitures. We will adjust the actual expense recognized due to future pre-vest forfeitures as they occur. We have estimated that 1.5% of our option grants will be forfeited prior to vesting.

Weighted average assumptions used in the Black Scholes option-pricing model for the nine months ended September 30, 2016 and the year ended December 31, 2015, were as follows:

|                                 | <b>Nine months<br/>ended<br/>September 30,<br/>2016</b> | <b>Year ended<br/>December 31,<br/>2015</b> |
|---------------------------------|---|---|
| Average risk-free interest rate | 1.69%   | 1.64%                                       |
| Average expected life- years    | 5.5   | 5.38  |
| Expected volatility             | 86.63%  | 86.66%                                      |
| Expected dividends              | \$ 0.0  | \$ 0.0                                      |

Stock-based compensation expense includes the expense related to (1) grants of stock options, (2) grants of restricted stock, (3) stock issued as consideration for some of the services provided by our directors and strategic advisory council members, and (4) stock issued in lieu of cash to pay bonuses to our employees and contractors. Grants of stock options and restricted stock are awarded to our employees, directors, consultants, and board members and we recognize the fair value of these awards ratably as they are earned. The expense related to payments in stock for services is recognized as the services are provided.

Stock-based compensation expense is recorded under the financial statement captions cost of services provided, general and administrative expenses and research and development expenses in the accompanying condensed consolidated statements of operations. For the nine months ended September 30, 2016 and 2015, we recognized stock-based compensation of approximately \$0.9 million and \$0.8 million, respectively. Related income tax benefits were not recognized, as we incurred a tax loss for both periods.

**Note 11. Business Segment Results**

We have two principal business segments, which are (1) our technology business and (2) our consulting services business. These business segments were determined based on the nature of the operations and the services offered. Operating segments are defined as components of an enterprise about which separate financial information is available that is evaluated regularly by the chief decision-makers, in deciding how to allocate resources and in assessing performance. Our Chief Executive Officer and Chief Financial Officer have been identified as the chief operating decision makers. Our chief operating decision makers direct the allocation of resources to operating segments based on the profitability, the cash flows, and the business plans of each respective segment.

Table of Contents**BUSINESS SEGMENT RESULTS - THREE MONTHS ENDED SEPTEMBER 30, 2016 AND 2015**

|                        | Consulting   |            | Technology   |              | Corporate and<br>Eliminations |              | Total          |              |
|------------------------|--------------|------------|--------------|--------------|-------------------------------|--------------|----------------|--------------|
|                        | 2016         | 2015       | 2016         | 2015         | 2016                          | 2015         | 2016           | 2015         |
| Revenue                | \$ 83,219    | \$ 234,163 | \$ 0         | \$ 0         | \$ 0                          | \$ 0         | \$ 83,219      | \$ 234,163   |
| Segment Profit (Loss)– |              |            |              |              |                               |              |                |              |
| Pre Tax                | \$ (103,758) | \$ (2,843) | \$ (441,874) | \$ (302,912) | \$ (957,885)                  | \$ 131,484   | \$ (1,503,517) | \$ (174,271) |
| Total Assets           | \$ 83,219    | \$ 255,035 | \$ 1,121,771 | \$ 893,187   | \$ 5,059,686                  | \$ 2,113,912 | \$ 6,264,676   | \$ 3,262,134 |
| Interest Expense       | \$ 0         | \$ 0       | \$ 0         | \$ 0         | \$ 4,689                      | \$ 0         | \$ 4,689       | \$ 0         |

**BUSINESS SEGMENT RESULTS – NINE MONTHS ENDED SEPTEMBER 30, 2016 AND 2015**

|                        | Consulting   |              | Technology     |              | Corporate and<br>Eliminations |              | Total          |                |
|------------------------|--------------|--------------|----------------|--------------|-------------------------------|--------------|----------------|----------------|
|                        | 2016         | 2015         | 2016           | 2015         | 2016                          | 2015         | 2016           | 2015           |
| Revenue                | \$ 372,142   | \$ 656,220   | \$ 0           | \$ 0         | \$ 0                          | \$ 0         | \$ 372,142     | \$ 656,220     |
| Segment Profit (Loss)– |              |              |                |              |                               |              |                |                |
| Pre Tax                | \$ (263,785) | \$ (142,402) | \$ (1,450,954) | \$ (910,458) | \$ (1,420,688)                | \$ (23,753)  | \$ (3,135,427) | \$ (1,076,613) |
| Total Assets           | \$ 83,219    | \$ 255,035   | \$ 1,121,771   | \$ 893,187   | \$ 5,059,686                  | \$ 2,113,912 | \$ 6,264,676   | \$ 3,262,134   |
| Interest Expense       | \$ 0         | \$ 0         | \$ 0           | \$ 0         | \$ 17,060                     | \$ 0         | \$ 17,060      | \$ 0           |

**Note 12. Fair Value Measurements**

We adopted the accounting guidance on fair value measurements for financial assets and liabilities measured on a recurring basis. The guidance requires fair value measurements be classified and disclosed in one of the following three categories:

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Level 1 Unadjusted quoted prices in active markets that are accessible at the measurement date for identical, unrestricted assets or liabilities;

Level 2 Quoted prices in markets that are not active or inputs which are observable, either directly or indirectly, for substantially the full term of the asset or liability;

Level 3 Prices or valuation techniques that require inputs that are both significant to the fair value measurement and unobservable (i.e., supported by little or no market activity).

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Annually, the board of directors assesses and approves the fair value measurement policies and procedures. At least annually, the finance department determines if the current valuation techniques used in the fair value measurements are still appropriate and evaluates and adjusts the unobservable inputs used in the fair value measurements based on current market conditions and third-party information. The following fair value hierarchy table presents information about each major category of the Company's financial liability measured at fair value on a recurring basis as of September 30, 2016 and December 31, 2015:

| (\$ rounded to nearest thousand) | Quoted prices<br>in<br>active markets | Fair value measurement using                              |  | Total      |
|----------------------------------|---------------------------------------|---|--|------------|
|                                  | (Level 1)                             | Significant<br>other<br>observable<br>inputs (Level<br>2) | Significant<br>unobservable<br>inputs<br>(Level 3) |            |
| Balance at September 30, 2016    |                                       |   |  |            |
| Liabilities:                     |                                       |   |  |            |
| Warrant liability                | \$ -                                  | \$ -  | \$ 121,000   | \$ 121,000 |

| (\$ rounded to nearest thousand) | Quoted prices<br>in<br>active markets | Fair value measurement using                              |  | Total        |
|----------------------------------|---------------------------------------|---|--|--------------|
|                                  | (Level 1)                             | Significant<br>other<br>observable<br>inputs (Level<br>2) | Significant<br>unobservable<br>inputs<br>(Level 3) |              |
| Balance at December 31, 2015     |                                       |   |  |              |
| Liabilities:                     |                                       |   |  |              |
| Warrant liability                | \$ -                                  | \$ -  | \$ 2,327,000                                       | \$ 2,327,000 |

The reconciliation of warrant liability measured at fair value on a recurring basis using unobservable inputs (Level 3) is as follows:

| (\$ rounded to nearest thousand)          | Warrant<br>Liability |
|---|----------------------|
| Balance at December 31, 2014              | \$ 4,633,000         |
| Change in fair value of warrant liability | (2,306,000)          |
| Balance at December 31, 2015              | \$ 2,327,000         |
| Reclassification to equity                | (692,000)            |
| Change in fair value of warrant liability | (1,643,000)          |
| Warrant modification expense              | 129,000              |

|                               |    |         |
|-------------------------------|----|---------|
| Balance at September 30, 2016 | \$ | 121,000 |
|-------------------------------|----|---------|

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The fair value of the warrant liability is based on Level 3 inputs. For this liability, the Company developed its own assumptions that do not have observable inputs or available market data to support the fair value. See Note 9 – Warrant Liability for further discussion of the warrant liability. Significant increases (decreases) in any of those Level 3 inputs in isolation would result in a significantly lower (higher) fair value measurement.

We believe that the fair values of our current assets and current liabilities approximate their reported carrying amounts. There were no transfers between Level 1, 2 and 3 at September 30, 2016 and December 31, 2015.

**Note 13. Subsequent Events**

*Equity Transactions*

From October 1, 2016 to November 9, 2016, the Company has generated additional net proceeds of approximately \$624,000 under the ATM agreement with MLV from the sale of approximately 370,000 shares of its common stock.

*Short-Term Non-Qualified Option Grants*

On November 3, 2016, the Compensation Committee of the Board of Directors granted short-term non-qualified stock options relating to approximately 670,000 shares under the 2015 Equity Incentive Plan to employees and consultants of the Company. Approximately 48% of these stock options granted by the Compensation Committee will be considered issued and will vest immediately, all with a strike price of \$1.54, which was the closing price of the Company's stock on November 9, 2016. These options have a 10 year contractual term, with a fair market value of \$1.04 per option with an expected term of 5 years. Approximately 52% of these stock options will be considered issued and vested upon the Company receiving shareholder approval at the 2017 Shareholders' Annual Meeting, to increase the number of shares and options available to be issued under the 2015 Equity Incentive Plan.



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**ITEM 2. MANAGEMENT’S DISCUSSION AND ANALYSIS OF FINANCIAL CONDITION AND RESULTS OF OPERATIONS**

The following Management’s Discussion and Analysis of Financial Condition and Results of Operations, or MD&A, is intended to help the reader understand Lightbridge Corporation, our operations and our present business environment. MD&A is provided as a supplement to, and should be read in conjunction with, our condensed consolidated financial statements and the accompanying notes thereto contained in Part I, “Item 1. Financial Statements” of this report. This overview summarizes the MD&A, which includes the following sections:

- *Overview of Our Business* — a general overview of our two business segments, the material opportunities and challenges of our business;
- *Critical Accounting Policies and Estimates* — a discussion of accounting policies that require critical judgments and estimates;
- *Operations Review* — an analysis of our consolidated results of operations for the two years presented in our consolidated financial statements. Except to the extent that differences among our operating segments are material to an understanding of our business as a whole, we present the discussion in the MD&A on a consolidated basis; and
- *Liquidity, Capital Resources and Financial Position* — an analysis of our cash flows and an overview of our financial position.

As discussed in more detail under “Forward-Looking Statements” immediately preceding this MD&A, the following discussion contains forward-looking statements that involve risks, uncertainties, and assumptions such as statements of our plans, objectives, expectations, and intentions. Our actual results may differ materially from those discussed in these forward-looking statements because of the risks and uncertainties inherent in future events.

**OVERVIEW OF OUR TWO BUSINESS SEGMENTS**

When used in this report, the terms “Lightbridge”, “Company”, “we”, “our”, and “us” refer to Lightbridge Corporation and wholly-owned subsidiaries Thorium Power, Inc. (a Delaware corporation) and Lightbridge International Holding, LLC (a Delaware limited liability company).

Lightbridge is a leading nuclear fuel technology company and we participate in the nuclear power industry in the United States and internationally. Our mission is to be a world leader in the design and deployment of nuclear fuels that we anticipate will be economically attractive, enhance reactor safety, proliferation resistant, and produce less waste than current generation nuclear fuels, and to provide world-class strategic advisory services to governments and utilities seeking to develop or expand civil nuclear power programs.

Our business operations can be categorized in two segments:

- (1) Our nuclear fuel technology business segment - we develop next generation nuclear fuel technology that has the potential to significantly increase the power output of commercial reactors, reducing the cost of generating electricity and the amount of nuclear waste on a per-megawatt-hour basis and enhancing reactor safety and the proliferation resistance of spent fuel. Our main focus is on our nuclear fuel technology business segment.
- (2) Our nuclear energy consulting business segment - we provide nuclear power consulting and strategic advisory services to commercial and governmental entities worldwide. Our nuclear consulting business operations are intended to help defray a portion of the costs relating to the development of our nuclear fuel technology.

Financial information about our business segments is included in Note 11 Business Segment Results, of the Notes to the Condensed Consolidated Financial Statements, included in Part I Item 1, Financial Statements of this Quarterly Report on Form 10-Q.

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**Fuel Technology Business Segment Overview**

Since the founding of our company, we have been engaged in the design and development of proprietary, innovative nuclear fuels. This effort has led us to develop a metallic fuel rod design that is at the heart of each of our nuclear fuel products. The Company's efforts are focused on the success of our nuclear fuel.

We are focusing our development efforts on all-metal fuel (i.e., non-oxide fuel) for currently operating as well as new build reactors. The Company also owns fuel assembly designs for all-uranium seed and blanket fuel for existing plants and new build reactors and thorium-based seed and blanket fuel for both existing and new build reactors. Each of the fuel designs utilizes our metallic fuel rod technology, and each design advances our mission to improve the cost competitiveness, safety, proliferation resistance, and performance of nuclear power generation. The Company's focus on metallic fuel is based on input from nuclear utilities that have expressed interest in the improved economics and enhanced safety that metallic fuel can provide.

In response to the challenges associated with conventional oxide fuels, we believe our innovative, proprietary metallic fuels will be capable of significantly higher burnup and power density compared to conventional oxide fuels. The fuel in a nuclear reactor generates heat energy. That heat is then converted through steam into electricity that is sold. Burnup is the total amount of electricity generated per unit mass of nuclear fuel, and is a function of the power density of a nuclear fuel and the amount of time the fuel operates in the reactor. Power density is the amount of heat power generated per unit volume of nuclear fuel. Conventional oxide fuel used in existing commercial reactors is approaching the limits of its burnup and power density capability. As a result, further optimization to increase power output from the same core size and improve the economics and safety of nuclear power generation using conventional oxide fuel technologies is limited. As the industry prepares to meet the increasing global demand for electricity production, electric utilities are seeking longer operating cycles and higher reactor power outputs as solutions for the current and future reactor fleet.

We believe our proprietary nuclear fuel designs have the potential to significantly enhance the nuclear power industry's economics and increase power output by:

- providing an increase in power output of up to 10% while simultaneously extending the operating cycle length from 18 to 24 months in existing pressurized water reactors (which are currently constrained to an 18-month operating cycle by oxide fuel); or increasing the power up to 17% while retaining an 18-month operating cycle;
- enabling increased reactor power output (up to 30% increase) without changing the core size in new build pressurized water reactors (PWRs); and
- reducing the volume of spent fuel per kilowatt-hour as well as enhancing proliferation resistance of spent fuel.

There are significant technology synergies among our primary fuel products due to utilization of the proprietary metallic fuel rod technology that is at the core of each of them. Once completed, a full-scale demonstration and qualification of the metallic fuel rod technology will simultaneously advance all of our product families currently under development. Due to the significantly lower fuel operating temperature, we expect that our metallic nuclear fuel rods will provide major improvements to safety margins during off-normal events.

We are focusing our development efforts on the metallic fuel with a power uprate of up to 10% and a 24-month operating cycle in existing Westinghouse-type four-loop pressurized water reactors. Those reactors represent a large segment of the global market and comprise our initial target market. Our metallic fuel could also be adapted for use in other types of water-cooled commercial power reactors, such as boiling water reactors, Canada Deuterium Uranium (“CANDU”) heavy water reactors, as well as water-cooled small and modular reactors.

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US Nuclear Regulatory Commission licensing processes require engineering analysis of a large break loss-of-coolant accident (“LOCA”), as well as many other scenarios. The LOCA scenario assumes failure of a large water pipe in the reactor coolant system. Under LOCA conditions, the fuel and cladding temperatures rise due to reduced cooling capacity. Preliminary analytical modeling shows that under a design-basis LOCA scenario, unlike conventional uranium dioxide fuel, the cladding of the Lightbridge-designed metallic fuel rods would stay at least 200 degrees below the 850-900 degrees Celsius temperature at which steam begins to react with the zirconium cladding to generate hydrogen gas. Buildup of hydrogen gas in a nuclear power plant can lead to detonation of the hydrogen. Lightbridge fuel is designed to prevent hydrogen gas generation in design-basis LOCA situations, which is a major safety benefit.

We believe our fuel designs will allow current and new build nuclear reactors to safely increase power production and reduce operations and maintenance costs on a per kilowatt-hour basis. New build nuclear reactors could also benefit from the reduced upfront capital investment per kilowatt of generating capacity. In addition to the projected electricity production cost savings, we believe that our technology can result in utilities or countries needing to deploy fewer new reactors to generate the same amount of electricity, resulting in significant capital cost savings. For utilities or countries that already have operating reactors, our technology could be utilized to increase the power output of those reactors as opposed to building new reactors. Further, we believe that the fuel fabrication or manufacturing process for this new fuel design is simpler, which we expect could lower fuel fabrication costs.

***Climate Change and Nuclear Energy Fuel Market***

We see a strong and increasing trend globally toward addressing climate change, which causes us to focus more closely on our nuclear fuel technology as one means to prevent climate change.

Nuclear power is useful as a means to reduce greenhouse gas emissions since reactors emit no carbon dioxide. Lightbridge metallic nuclear fuel technology is well-suited to be used as a means to prevent climate change since the fuel can be used in existing reactors, as well as in new reactors that will be deployed. Increased electricity generation resulting from use of Lightbridge fuel will be a low-cost option to add base load electricity to the electric grid of any country that already has a reactor that can use Lightbridge fuel. In our analysis, the world can only meet its growing energy and climate goals with increased use of nuclear power, and expansion of nuclear power will be facilitated by the economic and safety benefits of Lightbridge metallic fuel.

In certain markets with a diversified energy base, decisions on new build power plants are largely affected by the economics of various energy sources. If prices of non-nuclear energy sources, in particular natural gas, fall below or remain below the cost of electricity from new nuclear generation facilities, it could limit the deployment of new build nuclear power plants in such markets. This could reduce the size of the potential markets for our fuel technology. If prices or production costs of non-nuclear energy increase, there may be increased demand for the deployment of new build nuclear power plants.

**Consulting Business Segment Overview**

Our business model expanded with the establishment of a consulting business segment in 2007, through which we provide consulting and strategic advisory services to companies and governments planning to create or expand electricity generation capabilities using nuclear power plants. On August 1, 2008, we signed separate consulting services agreements with two government entities: Emirates Nuclear Energy Corporation (“ENEC”) formed by Abu Dhabi, one of the member Emirates of the United Arab Emirates (“UAE”), and the Federal Authority for Nuclear Regulation (“FANR”) formed by the government of the UAE. Under these two original agreements, we have provided consulting and strategic advisory services over a contract term of five years starting from June 23, 2008. The FANR contract has been extended to December 31, 2016. The FANR contract can be extended upon agreement by both parties.

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**Recent Developments**

*Nuclear Fuel Developments*

· *Southern Nuclear Operating Company, Inc.*

On November 2, 2016, we executed a non-binding letter of intent (“LOI”) with Southern Nuclear Operating Company, Inc. (“Southern Nuclear”) relating to the intent to enter into negotiations with regard to an agreement for lead test assembly operation (“LTA Agreement”) in one of Southern Nuclear’s operating nuclear power reactors using Lightbridge-designed nuclear fuel, subject to certain conditions and requirements. In the event the LTA Agreement is not executed on or before December 31, 2017 (such date may be extended by the mutual agreement of both parties) the LOI would terminate. One of the conditions is that we enter into a joint venture or similar business arrangement with AREVA NP to supply the fuel. This joint venture will provide Southern Nuclear with a written outline regarding how it will support Southern Nuclear in obtaining a license amendment and or any other regulatory compliance actions.

· *AREVA Agreements*

On October 31, 2016, we executed a non-binding term sheet (“term sheet”) with AREVA NP relating to the creation of a new joint venture to develop, manufacture and commercialize fuel assemblies based on Lightbridge’s innovative metallic nuclear fuel technology. This term sheet includes the agreed upon key terms for the creation of a new joint venture company. The term sheet outlines key areas for a U.S.-based joint venture to be equally owned by each company, covers fuel assemblies for most types of light water reactors, including pressurized water reactors (PWRs), boiling water reactors (BWRs), small modular reactors (SMRs), and research reactors. We expect to formalize the joint venture in the coming months with AREVA NP.

On March 14, 2016, we entered into a joint development agreement (“JDA”) with AREVA which will define the different steps (including, without limitation, a feasibility study, a business plan, and an implementation action plan), working groups, and methodology to determine the feasibility and opportunity of future joint ventures between the parties. The joint development agreement provides the process by which the parties will execute definitive documentation for the joint ventures, including a term sheet that will set forth the main terms of the definitive joint venture agreements.

As part of the definitive joint venture agreements, based on successful completion of the scope of work under the JDA, Lightbridge and AREVA will agree on: (1) terms and conditions to complete the remaining scope of work to demonstrate and commercialize the fuel assemblies based on Lightbridge’s metallic nuclear fuel, and (2) a technology

licensing arrangement and other agreements needed to form and operate the joint venture company. The companies have agreed to work exclusively together in the area covered by the JDA, which will remain in force until the formation of the joint venture or December 31, 2016 at the latest.

- ***CleanEquity Monaco Award.*** On March 4, 2016, we won the CleanEquity Monaco Award for Excellence in Technology Research for our innovation in nuclear fuel. The award is presented annually by His Serene Highness Prince Albert II of Monaco after the winner is selected by a panel of independent judges.

#### ***Aspire Option Agreement***

On August 10, 2016 the Company entered into an option agreement with Aspire Capital whereby the Company has the right, at any time prior to December 31, 2019, to require Aspire Capital to enter into with the Company, up to two common stock purchase agreements each with a three year term, with an aggregate amount under both purchase agreements combined not to exceed \$20,000,000 (see Note 10 of the notes to the accompanying condensed consolidated financial statements).

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***NASDAQ Hearings Panel Decision***

On July 27, 2016, a Nasdaq Hearings Panel issued its decision letter to the Company and granted the Company's request for continued listing of the Company's common stock on the Nasdaq Capital Market.

***Reverse Stock Split***

On July 20, 2016, at the opening of trading, we effected a one-for-five reverse split of our common shares. The common shares began trading on a split-adjusted basis on July 20, 2016. The primary purpose of the reverse split was to bring us into compliance with the Nasdaq's \$1.00 minimum bid price requirement to maintain our stock listing on Nasdaq.

Our historical financial results have been adjusted to reflect a reduction in the number of shares of our outstanding common stock from 25,916,155 shares to 5,183,231 shares at September 30, 2016 and from 18,628,957 shares to 3,725,819 shares at December 31, 2015. In addition, effective upon the reverse stock split, the number of authorized shares of our common stock was reduced from 500 million shares to 100 million shares and the number of authorized preferred stock was reduced from 50 million shares to 10 million shares. All fractional shares were rounded up to the nearest share. All share data herein has been retroactively adjusted for the reverse stock split.

***Securities Purchase Agreement - Aspire Capital Fund, LLC***

On June 28, 2016, we entered into a Securities Purchase Agreement with Aspire Capital pursuant to which the Company has agreed to sell up to \$5.0 million of shares of the Company's common stock to Aspire Capital, without an underwriter or placement agent.

Pursuant to the Securities Purchase Agreement, the Company sold 371,400 shares of common stock and 295,267 pre-funded warrants at an exercise price of \$0.05 per share to Aspire Capital on June 28, 2016 for \$1.0 million. The Securities Purchase Agreement provides for the sale of up to an additional \$4.0 million of the Company's common stock to Aspire Capital upon the achievement of certain milestones, as follows:

- on or before October 31, 2016, \$1.0 million of the Company's common stock upon the Company's announcement of its entry into a strategic arrangement regarding Lightbridge- designed nuclear fuel with one

or more major nuclear utilities; but this milestone was not satisfied and

*Securities Purchase Agreement – General International Holdings, Inc.*

On June 28, 2016, we entered into a Securities Purchase Agreement with General International Holdings, Inc. (“GIH”), pursuant to which GIH purchased 1,020,000 shares of the Company’s newly created Non-Voting Series A Convertible Preferred Stock (the “Series A Preferred Stock”) for \$2.8 million or approximately \$2.75 per share, subject to the terms and conditions set forth in the Purchase Agreement (the “GIH Offering”).

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The Series A Preferred Stock is non-voting and is convertible at the option of the holder into shares of the Company's common stock initially on a one-for-one basis. Dividends accrue on the Series A Preferred Stock at the rate of 7% per year and will be paid in-kind. The Company has the option of forcing the conversion of the Series A Preferred Stock if the trading price for the Company's common stock is more than two times the applicable conversion price (approximately \$2.75 per share) before the third anniversary of the issuance of the Series A Preferred Stock, or if the trading price is more than three times the applicable conversion price following the third anniversary of issuance. The Company may also redeem the Series A Preferred Stock following the third anniversary of the issuance.

The Company closed the GIH Offering on August 2, 2016. At the closing, Mr. Xingping Hou, the president of GIH, joined the Company's Board of Directors as co-Chairman. The Company expects to use the proceeds from the GIH Offering for general corporate purposes, including but not limited to research and development. The Company did not use an underwriter or placement agent in connection with the GIH Offering.

### ***Research and Development Project Schedule***

We currently anticipate that we, working in collaboration with our development partners/vendors and in certain cases contingent upon execution of collaborative research and development agreements with them will be able to:

- Have semi-scale metallic fuel samples fabricated in 2017 for irradiation testing in a test reactor environment under prototypic commercial reactor conditions;
- Begin lead test assembly (LTA) operation in a full-size commercial light water reactor as soon as 2020-2021, which involves testing a limited number of full-scale fuel assemblies in the core of a commercial nuclear power plant over three 18-month cycles. Accordingly, based on our current estimated schedule, a purchase order for an initial reload batch placed by a utility is expected as soon as 2023-2024 (after two 18-month cycles of LTA operation), with final qualification (i.e., deployment of fuel in the first reload batch) in a commercial reactor expected as soon as 2025-2026. In the interim, once we have the initial fuel performance data from loop irradiation of our fuel samples in a research reactor under prototypic operating conditions of a commercial power reactor, which is currently anticipated by 2018, we will target entry into a commercial arrangement with one or more major fuel fabricators that may include upfront technology access fees and/or engineering support or consulting payments to us.

### ***Technology Committee***

On May 4, 2016, the Company's Board of Directors (the "Board") approved creation of a Technology Committee of the Board, effective immediately. The Board delegated full power and exclusive authority to the Technology Committee over all matters involving the Company's activities that may be subject to Part 810 of Title 10 of the Code of Federal Regulations of the United States ("Part 810"). To comply with Part 810 regulations, only members of the Board who are U.S. citizens or U.S. lawful permanent residents can serve on the Technology Committee.

### **OUR BUSINESS STRATEGY – NUCLEAR FUEL TECHNOLOGY BUSINESS SEGMENT**

We intend to monetize our intellectual property for nuclear fuel designs to existing major nuclear fuel fabricators that have fuel supply contracts with utilities that own and operate nuclear power plants worldwide. We believe such partnering will allow us to take advantage of the existing customer base of fuel fabricators, thus enabling our fuel products to achieve higher market penetration rates in a relatively short period of time. We are pursuing a research, development, and demonstration strategy aimed at generating sufficient interest and confidence in our fuel technology among major fuel fabricators with a view to entering into a commercial arrangement with one or more of them near the completion of the first half of our loop irradiation testing program. We believe there may be opportunities for monetizing our fuel fabrication technology and engineering support fees from fuel fabricators.

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Our commercialization efforts are based on a multi-prong approach that we believe will increase the likelihood of success:

1. Approach major fuel fabricators (push marketing to our direct licensing customers)
2. Early outreach to nuclear power utilities (pull marketing through the customers of the fuel fabricators)
3. Generate public, industry, and government awareness of our fuel technologies

We have been putting a significant amount of effort into reaching out to major fuel fabricators. Our ultimate commercial success depends on how soon and what kind of a commercial arrangement we are able to negotiate with one or more of these potential partners. As a result, building relationships with these potential partners and keeping them up-to-date on our fuel technology demonstration progress through ongoing dialogue are the essential elements of our commercialization strategy.

**CRITICAL ACCOUNTING POLICIES AND ESTIMATES**

The preparation of financial statements in conformity with generally accepted accounting principles requires management to make a variety of estimates and assumptions that affect (i) the reported amounts of assets and liabilities and disclosure of contingent assets and liabilities as of the date of the financial statements and (ii) the reported amounts of revenues and expenses during the reporting periods covered by the financial statements. For a discussion of the accounting judgments and estimates that we have identified as critical in the preparation of our financial statements, please see “Critical Accounting Policies and Estimates” under Item 7, “Management's Discussion and Analysis of Financial Condition and Results of Operations” in our Annual Report on Form 10-K filed on March 15, 2016, incorporated herein by reference. There have been no significant changes in our critical accounting policies and estimates during the nine months ended September 30, 2016.

Our management expects to make judgments and estimates about the effect of matters that are inherently uncertain. As the number of variables and assumptions affecting the future resolution of the uncertainties increase, these judgments become even more subjective and complex. Although we believe that our estimates and assumptions are reasonable, actual results may differ significantly from these estimates. Changes in estimates and assumptions based upon actual results may have a material impact on our results of operations and/or financial condition.

***Recent Accounting Standards and Pronouncements***

Refer to Note 1 of the Notes to our condensed consolidated financial statements for a discussion of recent accounting standards and pronouncements.

## **OPERATIONS REVIEW**

### ***Business Segments and Periods Presented***

We have provided a discussion of our results of operations on a consolidated basis and have also provided certain detailed segment information for each of our business segments below for the three months and nine months ended September 30, 2016 and 2015, in order to provide a meaningful discussion of our business segments. We have organized our operations into two principal segments: Consulting and Technology Business segments. We present our segment information along the same lines that our chief executives review our operating results in assessing performance and allocating resources.

Table of Contents**BUSINESS SEGMENT RESULTS - THREE MONTHS ENDED SEPTEMBER 30, 2016 AND 2015**

|                         | Consulting   |            | Technology   |              | Corporate and<br>Eliminations |              | Total          |              |
|-------------------------|--------------|------------|--------------|--------------|-------------------------------|--------------|----------------|--------------|
|                         | 2016         | 2015       | 2016         | 2015         | 2016                          | 2015         | 2016           | 2015         |
| Revenue                 | \$ 83,219    | \$ 234,163 | \$ 0         | \$ 0         | \$ 0                          | \$ 0         | \$ 83,219      | \$ 234,163   |
| Segment Profit (Loss) – |              |            |              |              |                               |              |                |              |
| Pre Tax                 | \$ (103,758) | \$ (2,843) | \$ (441,874) | \$ (302,912) | \$ (957,885)                  | \$ 131,484   | \$ (1,503,517) | \$ (174,271) |
| Total Assets            | \$ 83,219    | \$ 255,035 | \$ 1,121,771 | \$ 893,187   | \$ 5,059,686                  | \$ 2,113,912 | \$ 6,264,676   | \$ 3,262,134 |
| Interest Expense        | \$ 0         | \$ 0       | \$ 0         | \$ 0         | \$ 4,689                      | \$ 0         | \$ 4,689       | \$ 0         |

***Technology Business***

Over the next 12 to 15 months, we expect to incur approximately \$3 million to \$4 million in research and development expenses related to the development of our proprietary nuclear fuel designs. We spent approximately \$0.4 million and \$0.3 million for research and development during each of the three months ended September 30, 2016 and 2015, respectively.

Over the next 2-3 years, we expect that our research and development activities will increase and will be primarily focused on testing and demonstration of our metallic fuel technology for Western-type water-cooled reactors. The main objective of this research and development phase is to prepare for full-scale demonstration of our fuel technology in an operating commercial power reactor.

***Consulting Services Business***

At the present time, all of our revenue for the three months ended September 30, 2016 and 2015 is from our consulting services business segment. The fee type and structure that we offer for each client engagement is dependent on a number of variables, including the complexity of the services, the level of the opportunity for us to improve the client's electricity generation capabilities using nuclear power plants, and other factors.

**Consolidated Results of Operations – Three Months Ended September 30, 2016 and 2015**

The following table presents our historical operating results and the increase (decrease) in amounts for the periods indicated:

|                                   | <b>Three Months Ended</b> |                |                   |                   |
|-----------------------------------|---------------------------|----------------|-------------------|-------------------|
|                                   | <b>September 30,</b>      |                |                   |                   |
|                                   | <b>2016</b>               | <b>2015</b>    | <b>(Decrease)</b> | <b>(Decrease)</b> |
|                                   |                           |                | <b>Change \$</b>  | <b>Change %</b>   |
| Consulting Revenues               | \$ 83,219                 | \$ 234,163     | \$ (150,944)      | (64)%             |
| Consulting expenses               | \$ 43,919                 | \$ 118,954     | \$ (75,035)       | (63)%             |
| Gross profit                      | \$ 39,300                 | \$ 115,209     | \$ (75,909)       | (66)%             |
| General and administrative        | \$ 1,106,125              | \$ 1,067,166   | \$ 38,959         | 4%                |
| Research and development expenses | \$ 441,874                | \$ 302,912     | \$ 138,962        | 46%               |
| Total Operating Loss              | \$ (1,508,699)            | \$ (1,254,869) | \$ 253,830        | 20%               |
| Other Income and (Expenses)       | \$ 5,182                  | \$ 1,080,598   | \$ (1,075,416)    | (100)%            |
| Net loss - before income taxes    | \$ (1,503,517)            | \$ (174,271)   | \$ 1,329,246      | 763%              |

Table of Contents**Revenue**

The following table presents our revenues, by business segment, for the three months presented (rounded in millions):

|                              | <b>Three Months Ended</b> |               |
|------------------------------|---------------------------|---------------|
|                              | <b>September 30,</b>      |               |
|                              | <b>2016</b>               | <b>2015</b>   |
| Consulting Segment Revenues: |                           |               |
| ENEC and FANR (UAE)          | \$ 0.0                    | \$ 0.2        |
| Other                        | 0.1                       | 0.0           |
| <b>Total</b>                 | <b>0.1</b>                | <b>0.2</b>    |
| Technology Segment Revenues  | 0.0                       | 0.0           |
| <b>Total Revenues</b>        | <b>\$ 0.1</b>             | <b>\$ 0.2</b> |

The decrease in our revenues from 2016 to 2015 of \$0.1 million resulted from the net decrease in the work performed for our FANR project of approximately \$0.2 million, offset by an increase in revenue working on one other project as a subcontractor of approximately \$0.1 million. Our consulting projects with FANR are being performed pursuant to ongoing requests to work on specific projects on a time and expense basis as needed. The FANR contract was extended to December 31, 2016. The future revenue to be earned and recognized under the FANR agreement will depend upon agreed upon work plans that are under current discussion, which can differ from the revenue amounts initially planned to be earned under these agreements.

The market for nuclear industry consulting services is competitive, fragmented, and subject to rapid change. We believe that our independence, experience, expertise, reputation and segment focus enable us to compete effectively in this marketplace.

See Note 1 and Note 3 of the notes to our condensed consolidated financial statements included in Part I Item 1 of this Quarterly Report on Form 10-Q for additional information about our revenue.

**Costs and Expenses**

The following table presents our cost of services provided, by business segment, for the periods presented (rounded in millions):

**Three Months Ended  
September 30,  
2016                      2015**

|            |    |     |    |     |
|------------|----|-----|----|-----|
| Consulting | \$ | 0.0 | \$ | 0.1 |
| Technology |    | 0.0 |    | 0.0 |
| Total      | \$ | 0.0 | \$ | 0.1 |

Table of Contents***Cost of Services Provided***

The cost of services provided for the three months ended September 30, 2016 versus the three months ended September 30, 2015 decreased due to the decrease in revenue. Cost of services provided is comprised of expenses related to the consulting, professional, administrative, and other support costs and stock-based compensation allocated to our consulting projects labor, which were incurred to perform and support the work done for our consulting projects with FANR and our other contracts. Total stock based compensation allocated to our cost of services was not significant for the three months ended September 30, 2016 and for the three months ended September 30, 2015. The billing rates available to us from our outside consultants who provide services under our consulting contracts predominantly remained the same in 2016 and 2015. If consulting revenues increase in future periods, we expect cost of services provided will increase in dollar amount and may increase as a percentage of revenues due to increased pricing competition for consulting contracts.

Total reported gross profit margin for the three months ended September 30, 2016 was 47% compared to 49% for the three months ended September 30, 2015, substantially the same for both periods.

See Note 1-Basis of presentation and Note 3-Accounts Receivable – Project Revenue and Project Costs of the notes to our condensed consolidated financial statements included in Part I Item 1 of this Quarterly Report on Form 10-Q for additional information about our cost of services provided.

***Research and Development***

The following table presents our research and development expenses, (rounded in millions):

|                                   | <b>Three Months Ended</b> |             |
|-----------------------------------|---------------------------|-------------|
|                                   | <b>September 30,</b>      |             |
|                                   | <b>2016</b>               | <b>2015</b> |
| Research and development expenses | \$ 0.4                    | \$ 0.3      |

Research and development expenses consist mostly of compensation and related overhead costs for personnel responsible for the research and development of our fuel. Total research and development expenses remained primarily the same for the three month periods ended September 30, 2016 and 2015. There was an increase in research and development expenses for our nuclear fuel with IFE, CNL and BWXT of approximately \$0.1 million in 2016 and an increase in stock-based compensation allocated to research and development expenses in 2016 of approximately

\$0.1 million. These increases were offset by a decrease in consulting fees and other research and development expenses of approximately \$0.1 million. Total stock-based compensation included in research and development expenses was approximately \$112,000 and \$58,000 for the three months ended September 30, 2016 and 2015, respectively, due to the increase in stock option grants in the fourth quarter of 2015.

All of our reported research and development activities were conducted in the United States, Canada, Norway, and Russia. We expense research and development costs as they are incurred. Research and development expenses may increase in dollar amount and may increase as a percentage of revenues in future periods because we expect to invest \$3 million to \$3.5 million in the development of our nuclear fuel products over the next 12-15 months.

See Note 8 - Research and Development expense of the Notes to our condensed consolidated financial statements included in Part I Item 1 of this Quarterly Report Form on 10-Q for additional information about our research and development costs.

Table of Contents**General and Administrative Expenses**

The following table presents our general and administrative expenses, (rounded in millions):

|                                     | <b>Three Months Ended</b> |             |
|-------------------------------------|---------------------------|-------------|
|                                     | <b>September 30,</b>      |             |
|                                     | <b>2016</b>               | <b>2015</b> |
| General and administrative expenses | \$ 1.1                    | \$ 1.1      |

General and administrative expenses consist mostly of compensation and related costs for personnel and facilities, stock-based compensation, finance, human resources, information technology, and fees for consulting and other professional services. Professional services are principally comprised of outside legal, audit, strategic advisory services and outsourcing services.

There was an increase in stock-based compensation of approximately \$0.1 million, offset by a decrease in rent and other general and administrative expenses of approximately \$0.1 million. Total stock-based compensation included in general and administrative expenses were approximately \$273,000 and \$151,000 for the three months ended September 30, 2016 and 2015, respectively. The increase in stock-based compensation was due to stock options granted in the last quarter of 2015 and the decrease in rent was due to the relocation of the office in 2016 to smaller space.

See Note 10 - Stockholders' Equity of the notes to our condensed consolidated financial statements included in this Quarterly Report on Form 10-Q for information regarding our stock-based compensation.

***Other Income (Expenses)***

There was decrease in net other income of approximately \$1.1 million. This decrease was due to a decrease in warrant valuation income of approximately \$1.0 million and an increase in financing cost expense of approximately \$0.1 million. The change for the warrant revaluation in our statements of operations is due to a change in the fair value of the warrant liability as a result of a change in our stock price, change in the contractual life and change in the volatility factors of the warrants. The increase in financing costs was due to the amortization of the deferred financing costs asset recorded for the Aspire option agreement (see Note 10 of the notes to the accompanying condensed consolidated financial statements).

See Note 9-Warrant Liability of the notes to our condensed consolidated financial statements included in this Quarterly Report on Form 10-Q for information regarding our warrant liability.

Interest income and other income and expenses, for the three months ended September 30, 2016 as compared to the three months ended September 30, 2015, was substantially the same.

***Provision for Income Taxes***

The following table presents our provision for income taxes. Our effective tax rate for the periods presented is 38%.

|                            | <b>Three Months Ended</b> |             |
|----------------------------|---------------------------|-------------|
|                            | <b>September 30,</b>      |             |
|                            | <b>2016</b>               | <b>2015</b> |
| Provision for income taxes | \$ 0.0                    | \$ 0.0      |

We incurred a pre-tax net loss for both 2016 and 2015. We reviewed all sources of income for purposes of recognizing the deferred tax assets and concluded a full valuation allowance for 2016 and 2015 was necessary. Therefore we did not have a provision for taxes for both the three months ended September 30, 2016 and 2015.

Table of Contents**BUSINESS SEGMENT RESULTS - NINE MONTHS ENDED SEPTEMBER 30, 2016 AND 2015**

|                         | Consulting   |              | Technology     |              | Corporate and<br>Eliminations |              | Total          |                |
|-------------------------|--------------|--------------|----------------|--------------|-------------------------------|--------------|----------------|----------------|
|                         | 2016         | 2015         | 2016           | 2015         | 2016                          | 2015         | 2016           | 2015           |
| Revenue                 | \$ 372,142   | \$ 656,220   | \$ 0           | \$ 0         | \$ 0                          | \$ 0         | \$ 372,142     | \$ 656,220     |
| Segment Profit (Loss) – |              |              |                |              |                               |              |                |                |
| Pre Tax                 | \$ (263,785) | \$ (142,402) | \$ (1,450,954) | \$ (910,458) | \$ (1,420,688)                | \$ (23,753)  | \$ (3,135,427) | \$ (1,076,613) |
| Total Assets            | \$ 83,219    | \$ 255,035   | \$ 1,121,771   | \$ 893,187   | \$ 5,059,686                  | \$ 2,113,912 | \$ 6,264,676   | \$ 3,262,134   |
| Interest Expense        | \$ 0         | \$ 0         | \$ 0           | \$ 0         | \$ 17,060                     | \$ 0         | \$ 17,060      | \$ 0           |

**Consolidated Results of Operations**

The following table presents our historical operating results as a percentage of revenues for the periods indicated:

|                                   | 2016           | 2015           | (Decrease)<br>Change \$ | (Decrease)<br>Change % |
|-----------------------------------|----------------|----------------|-------------------------|------------------------|
| Consulting Revenues               | \$ 372,142     | \$ 656,220     | \$ (284,078)            | -43%                   |
| Cost of services provided         |                |                |                         |                        |
| Consulting expenses               | \$ 174,281     | \$ 452,007     | \$ (277,726)            | -61%                   |
| Gross profit                      | \$ 197,861     | \$ 204,213     | \$ (6,352)              | -3%                    |
| Operating Expenses                |                |                |                         |                        |
| General and administrative        | \$ 3,311,488   | \$ 3,106,265   | \$ 205,223              | 7%                     |
| Research and development expenses | \$ 1,450,954   | \$ 910,458     | \$ 540,496              | 59%                    |
| Total Operating Loss              | \$ (4,564,581) | \$ (3,812,510) | \$ 752,071              | 20%                    |
| Other Income and (Expenses)       | \$ 1,429,154   | \$ 2,735,897   | \$ 1,306,743            | -48%                   |
| Net loss - before income taxes    | \$ (3,135,427) | \$ (1,076,613) | \$ 2,058,814            | 191%                   |

**Revenue**

The following table presents our revenues, by business segment, for the nine months presented (rounded in millions):

**Nine Months Ended  
September 30,  
2016                      2015**

|                              |           |            |               |
|------------------------------|-----------|------------|---------------|
| Consulting Segment Revenues: |           |            |               |
| ENEC and FANR (UAE)          | \$        | 0.1        | \$ 0.5        |
| Other                        |           | 0.3        | 0.2           |
| <b>Total</b>                 |           | <b>0.4</b> | <b>0.7</b>    |
| Technology Segment Revenues  |           | 0.0        | 0.0           |
| <b>Total Revenues</b>        | <b>\$</b> | <b>0.4</b> | <b>\$ 0.7</b> |

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The decrease in our revenues from 2016 to 2015 of \$0.3 million resulted from the decrease in the work performed for our FANR project of approximately \$0.4 million. Our consulting projects with FANR are being performed pursuant to ongoing requests to work on specific projects on a time and expense basis as needed. The FANR contract was extended to December 31, 2016. The future revenue to be earned and recognized under the FANR agreement will depend upon agreed upon work plans that are under current discussion, which can differ from the revenue amounts initially planned to be earned under these agreements.

The market for nuclear industry consulting services is competitive, fragmented, and subject to rapid change. We believe that our independence, experience, expertise, reputation and segment focus enable us to compete effectively in this marketplace.

See Note 1 and Note 3 of the notes to our condensed consolidated financial statements included in Part I Item 1 of this Quarterly Report on Form 10-Q for additional information about our revenue.

***Costs and Expenses***

The following table presents our cost of services provided, by business segment, for the periods presented (rounded in millions):

|            | <b>Nine Months Ended</b> |     |             |     |
|------------|--------------------------|-----|-------------|-----|
|            | <b>September 30,</b>     |     |             |     |
|            | <b>2016</b>              |     | <b>2015</b> |     |
| Consulting | \$                       | 0.2 | \$          | 0.5 |
| Technology |                          | 0.0 |             | 0.0 |
| Total      | \$                       | 0.2 | \$          | 0.5 |

***Cost of Services Provided***

The cost of services provided for the nine months ended September 30, 2016 and 2015 decreased due to the decrease in revenue, as mentioned above. There was a decrease in stock-based compensation allocated to cost of services provided of approximately \$0.1 million and the decrease in labor costs allocated to cost of services provided of approximately \$0.1 million. Cost of services provided is comprised of expenses related to the consulting, professional, administrative, and other support costs and stock-based compensation allocated to our consulting projects labor, which were incurred to perform and support the work done for our consulting projects with FANR and our other contracts.

Total stock based compensation allocated to our cost of services provided totaled approximately \$32,000 and \$176,000 for the nine months ended September 30, 2016 and 2015, respectively. The billing rates available to us from our outside consultants who provide services under our consulting contracts predominantly remained the same in 2016 and 2015. If consulting revenues increase in future periods, we expect cost of services provided will increase in dollar amount and may increase as a percentage of revenues due to increased pricing competition for consulting contracts.

Total reported gross profit margin for the nine months ended September 30, 2016 was 53% compared to 31% for the nine months ended September 30, 2015, due primarily to a higher profit margin earned on one consulting project.

See Note 1-Basis of presentation and Note 3-Accounts Receivable – Project Revenue and Project Costs of the notes to our condensed consolidated financial statements included in Part I Item 1 of this Quarterly Report on Form 10-Q for additional information about our cost of services provided.

Table of Contents**Research and Development**

The following table presents our research and development expenses, (rounded in millions):

|                                   | <b>Nine Months Ended</b> |             |
|-----------------------------------|--------------------------|-------------|
|                                   | <b>September 30,</b>     |             |
|                                   | <b>2016</b>              | <b>2015</b> |
| Research and development expenses | \$ 1.5                   | \$ 0.9      |

Research and development expenses consist mostly of compensation and related overhead costs for personnel responsible for the research and development of our fuel. Total research and development expenses increased by approximately \$0.6 million in 2016, due to an increase in research and development activities for our nuclear fuel with IFE, CNL and BWXT of approximately \$0.4 million, an increase in professional fees of approximately \$0.1 million and an increase in salaries and benefits of approximately \$0.1 million. Total stock-based compensation included in research and development expenses remained approximately the same and was approximately \$261,000 and \$244,000 for the nine months ended September 30, 2016 and 2015, respectively.

All of our reported research and development activities were conducted in the United States, Canada, Norway, and Russia. We expense research and development costs as they are incurred. Research and development expenses may increase in dollar amount and may increase as a percentage of revenues in future periods. See Note 8 - Research and Development expense of the Notes to our condensed consolidated financial statements included in Part I Item 1 of this Quarterly Report Form on 10-Q for additional information about our research and development costs.

**General and Administrative Expenses**

The following table presents our general and administrative expenses, (rounded in millions):

|                                     | <b>Nine Months Ended</b> |             |
|-------------------------------------|--------------------------|-------------|
|                                     | <b>September 30,</b>     |             |
|                                     | <b>2016</b>              | <b>2015</b> |
| General and administrative expenses | \$ 3.3                   | \$ 3.1      |

General and administrative expenses consist mostly of compensation and related costs for personnel and facilities, stock-based compensation, finance, human resources, information technology, and fees for consulting and other professional services. Professional services are principally comprised of outside legal, audit, strategic advisory services and outsourcing services. Total general and administrative expenses increased by approximately \$0.2 million in 2016, due to an increase in payroll and related benefits of approximately \$0.1 million; increase in stock offering costs expensed of approximately \$0.1 million; an increase in professional fees of approximately \$0.1 million and an increase in other general and administrative costs of approximately \$0.2 million. These increases were offset by decreases in rent of approximately \$0.2 million and a decrease in stock-based compensation of approximately \$0.1 million.

The increase in professional fees was primarily due to the derivative warrant liability. The decrease in rent is due to the smaller office space we now occupy in 2016. Total stock based compensation allocated to our general and administrative expenses totaled approximately \$650,000 and \$597,000 for the nine months ended September 30, 2016 and 2015, respectively.

See Note 10 - Stockholders' Equity of the notes to our condensed consolidated financial statements included in this Quarterly Report on Form 10-Q for information regarding our stock-based compensation.

Table of Contents**Other Income (Expense) - (rounded in millions):**

Other income and expenses for the nine months ended September 30, 2016, as compared to the nine months ended September 30, 2015, decreased by approximately \$1.3 million. The non-cash warrant income decreased by approximately \$1.1 million; the warrant modification expense increased by approximately \$0.1 million and the increase in financing costs due to the amortization of deferred financing costs was approximately \$0.1 million.

During the nine months ended September 30, 2016 and 2015, we recorded non-cash warrant income of approximately \$1.6 million and \$2.7 million, respectively, for warrant revaluation in our statements of operations due to a change in the fair value of the warrant liability as a result of a change in our stock price, change in the contractual life and change in the volatility factors of the warrants.

The warrant modification expense of approximately \$0.1 million was due to the modification of the 2014 warrant terms, by reducing the exercise price from \$11.55 to \$6.25 and amending certain provisions of the warrant agreement.

See Note 9-Warrant Liability of the notes to our condensed consolidated financial statements included in this Quarterly Report on Form 10-Q for information regarding our warrant liability.

**Provision for Income Taxes**

The following table presents our provision for income taxes. Our effective tax rate for the periods presented is 38%.

|                            | <b>Nine Months Ended</b> |             |
|----------------------------|--------------------------|-------------|
|                            | <b>September 30,</b>     |             |
|                            | <b>2016</b>              | <b>2015</b> |
| Provision for income taxes | \$ 0.0                   | \$ 0.0      |

We incurred a pre-tax net loss for both 2016 and 2015. We reviewed all sources of income for purposes of recognizing the deferred tax assets and concluded a full valuation allowance for 2016 and 2015 was necessary. Therefore we did not have a provision for taxes for both nine months ended September 30, 2016 and 2015.

## **Liquidity, Capital Resources and Financial Position**

To date, our consulting revenue has not provided sufficient cash flow to cover both our research and development expenses and corporate overhead expenses.

The current primary potential sources of cash available to us are equity investments through our equity purchase agreements with Aspire Capital and our ATM agreement with MLV. We have no debt or debt credit lines and we have financed our operations to date through our consulting revenue and the sale of our common stock. We raised approximately \$0.2 million in 2015 from our ATM financing agreement, and as of the date of this filing, we have raised approximately \$3.6 million in 2016 through our equity purchase agreements with Aspire Capital. On June 28, 2016, we entered into a Securities Purchase Agreement with General International Holdings, Inc. (“GIH”), pursuant to which GIH purchased 1,020,000 shares of our newly created Non-Voting Series A Convertible Preferred Stock for \$2.8 million or approximately \$2.75 per share on August 2, 2016. We have also entered into an option agreement with Aspire Capital that will give us an option until December 31, 2019 to enter in two equity line agreements for a combined total of \$20 million (see Note 10 of the notes to the accompanying condensed consolidated financial statements).

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As of September 30, 2016, we had total cash and cash equivalents of approximately \$3.2 million. Our working capital at September 30, 2016, was approximately \$3.1 million. Our current average monthly cash flow shortfall based on our current operations, is anticipated to average in the range of approximately \$400,000-\$500,000 per month through the remainder of 2016 as we anticipate increasing spending on research and development. We are working to reduce our monthly cash flow shortfall and also currently seeking new sources of financing. We may delay incurring some operating expenses, which will reduce our cash flow shortfall for the next 12 months, if needed.

We have put in place an ATM financing arrangement with MLV and equity purchase agreements with Aspire Capital to fund our future research and development expenses and overhead expenses over the next 12 months. Based on the anticipated future equity fund raises from our ATM, equity purchase agreements with Aspire Capital and other equity raises, we expect to have sufficient working capital for the next 12 months of operations. The following table provides detailed information about our net cash flows for the nine months ended September 30, 2016 and 2015.

**Cash Flow (in millions)**

|   | <b>Nine Months Ended</b> |       |             |       |
|---|--------------------------|-------|-------------|-------|
|   | <b>September 30,</b>     |       |             |       |
|   | <b>2016</b>              |       | <b>2015</b> |       |
| Net cash used in operating activities     | \$                       | (3.9) | \$          | (2.5) |
| Net cash used in investing activities     | \$                       | (0.2) | \$          | (0.1) |
| Net cash provided by financing activities | \$                       | 6.8   | \$          | 0.1   |
| Net cash inflow (outflow)                 | \$                       | 2.7   | \$          | (2.5) |

**Operating Activities (in millions)**

The increase in our cash used in operating activities in 2016 of \$1.4 million was primarily due to the decrease in our revenue and the increase in our operating expenses in 2016 and the change in working capital items as explained below.

Cash used in operating activities for the nine months ended September 30, 2016, consisted of a net loss of \$3.1 million, net non-cash adjustments which increased cash flow used in operating activities of approximately \$0.5 million and a net decrease in working capital items of approximately \$0.3 million. The cash provided by working capital was due primarily to a decrease in accounts receivable of \$0.1 million due to our decreased revenue; offset by a decrease in accounts payable and accrued expenses of \$0.3 million due to our increase in payments to vendors; and a decrease in our deferred lease abandonment liability of \$0.1 million, due to rent payments made for the sub-leased prior office space.

Cash used in operating activities in the nine months ended September 30, 2015, consisted of net loss adjusted for non-cash expense items such as stock-based compensation, as well as the effect of changes in working capital. Cash used in operating activities for the nine months ended September 30, 2015, consisted of a net loss of \$1.1 million and net negative adjustments for non-cash expense items that increased cash used in operating activities totaling approximately \$1.7 million and a net increase in working capital items of \$0.3 million. Total cash provided by (used in) working capital consisted of an increase in accounts receivable of \$0.2 million, an increase in prepaid expenses of \$0.1 million.

### **Investing Activities**

Net cash used by our investing activities for the nine months ended September 30, 2016, as compared to net cash used by our investing activities in 2015 increased by approximately \$0.1 million due to an increase in spending for patent application costs. These applications are filed for the new developments resulting from our research and development activities in our technology business segment. We anticipate these patent costs to increase in the future periods due to the continuing research and development work we plan to perform on our all-metal fuel design.

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**Financing Activities**

Net cash provided by our financing activities for the nine months ended September 30, 2016, as compared to net cash provided by our financing activities for the nine months ended September 30, 2015 was an increase of \$6.7 million. There was an increase in the proceeds from the issuance of our common stock through our equity purchase agreements with Aspire Capital of approximately \$3.6 million and an increase in cash from the transfer of our restricted cash to our operating account of approximately \$0.3 million. There was also an increase in the proceeds from the issuance of our Series A Preferred Stock of \$2.8 million. There was also an increase in our short-term notes payable to a vendor of approximately \$0.1 million offset by payments on the note of approximately \$0.1 million.

On September 4, 2015, we entered into an equity purchase agreement with Aspire Capital, which provides that Aspire Capital is committed to purchase up to an aggregate of \$10.0 million of shares of our common stock over a two-year term, subject to our election to sell any such shares. We have approximately \$7.4 million of remaining availability under the equity line purchase agreement and we have received shareholder approval at our 2016 Annual Shareholder Meeting to issue up to 3.0 million shares of common shares pursuant to the equity line purchase agreement. On August 10, 2016 the Company entered into an option agreement with Aspire Capital whereby the Company has the right, at any time prior to December 31, 2019, to require Aspire Capital to enter into with the Company, up to two common stock purchase agreements each with a three year term, with an aggregate amount under both purchase agreements combined not to exceed \$20,000,000 (see Note 10 of the notes to the accompanying condensed consolidated financial statements).

On June 11, 2015, we entered into an ATM issuance sales agreement with MLV & Co. LLC, pursuant to which the Company may issue and sell shares of its common stock from time to time through MLV as the Company's sales agent. On December 2, 2015 we filed a prospectus supplement which increased the maximum amount registered for sale pursuant to the ATM sales agreement to \$5.8 million. The amount available under the Company's Form S-3 shelf registration statement, which may be used to register additional sales under the ATM sales agreement, will increase upon an increase in the company's stock price.

**Short-Term and Long-Term Liquidity Sources**

In addition to the ATM financing and equity purchase agreements financing arrangements discussed above, we will seek new financing or additional sources of capital, depending on the capital market conditions, over the next 12 months. There can be no assurance that some of these additional sources of capital will be made available to us. The primary potential sources of cash available to us are as follows:

1. Equity investment from investors; and

2. Strategic investment or cost-sharing contributions through alliances with major fuel vendors, fuel fabricators and/or other strategic parties during the next three years, to support the remaining research and development activities required to further enhance and complete the development of our fuel products to a commercial stage.

In support of our long-term business plan with respect to our fuel technology business, we endeavor to create strategic alliances with major fuel vendors, fuel fabricators and/or other strategic parties during the next three years, to support the remaining research and development activities required to further enhance and complete the development of our fuel products to a commercial stage. We may be unable to form such strategic alliances on terms acceptable to us or at all.

We will need to raise additional capital in 2017 by way of an offering of equity securities, an offering of debt securities, a financing through a bank, or a strategic alliance with another entity, options which we are currently exploring to fund our future research and development activities.

See Note 10- Stockholders' Equity of the notes to our condensed consolidated financial statements included in Part I Item 1 of this Quarterly Report on Form 10-Q for information regarding our ATM financing and equity purchase agreements financing arrangements.

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**Off Balance Sheet Arrangements**

We do not have any off balance sheet arrangements that have or are reasonably likely to have a current or future effect on our financial condition, changes in financial condition, revenues or expenses, results of operations, liquidity or capital expenditures or capital resources that is material to an investor in our securities.

**Inflation**

Our business, revenues, and operating results have not been affected in any material way by inflation.

**ITEM 3. QUANTITATIVE AND QUALITATIVE DISCLOSURES ABOUT MARKET RISK**

**Not Required.**

**ITEM 4. CONTROLS AND PROCEDURES.**

*Evaluation of Disclosure Controls and Procedures*

Our management, including our principal executive officer and principal financial officer, evaluated the disclosure controls and procedures related to the recording, processing, summarization and reporting of information in the periodic reports that we file with the SEC. These disclosure controls and procedures have been designed to ensure that information required to be disclosed by the Company in the reports that it files or submits under the Exchange Act is (a) recorded, processed, summarized and reported, within the time periods specified in the SEC's rules and forms and (b) accumulated and communicated to our management, including our principal executive officer and principal financial officer, as appropriate, to allow timely decisions regarding required disclosure. Based on this evaluation, our Chief Executive Officer and Chief Financial Officer concluded that our disclosure controls and procedures were effective at the reasonable assurance level as of September 30, 2016.

*Changes in Internal Controls Over Financial Reporting*

There were no changes in our internal control over financial reporting during the period covered by this report that have materially affected or are reasonably likely to materially affect, our internal control over financial reporting.

***Limitations on Effectiveness of Controls and Procedures***

In designing and evaluating the disclosure controls and procedures, management recognizes that any controls and procedures, no matter how well designed and operated, can provide only reasonable assurance of achieving the desired control objectives. In addition, the design of disclosure controls and procedures must reflect the fact that there are resource constraints and that management is required to apply its judgment in evaluating the benefits of possible controls and procedures relative to their costs.

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**PART II—OTHER INFORMATION**

**ITEM 1. LEGAL PROCEEDINGS**

From time to time, we may become involved in various lawsuits and legal proceedings which arise in the ordinary course of business. However, litigation is subject to inherent uncertainties, and an adverse result in these or other matters may arise from time to time that may harm our business. The Company is not involved in any material legal proceedings.

**ITEM 1A. RISK FACTORS**

You should carefully consider the risk factors discussed in Part I, Item 1A of the Company's Form 10-K for the year ended December 31, 2015.

**ITEM 2. UNREGISTERED SALES OF EQUITY SECURITIES OR USE OF PROCEEDS**

None

**ITEM 3. DEFAULTS UPON SENIOR SECURITIES**

Not Applicable

**ITEM 4. MINE SAFETY DISCLOSURES**

Not Applicable

**ITEM 5. OTHER INFORMATION**

Not Applicable

**ITEM 6. EXHIBITS**

Reference is made to the Exhibit Index beginning immediately after the signature page hereto.

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**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.

Date: November 10, 2016

**LIGHTBRIDGE CORPORATION**

By: */s/ Seth Grae*

Name: Seth Grae

Title: President, Chief Executive Officer

and

Director

(Principal Executive Officer)

By: */s/ Linda Zwobota*

Name: Linda Zwobota

Title: Chief Financial Officer

(Principal Financial Officer and Principal  
Accounting Officer)

Table of Contents**EXHIBIT INDEX****Exhibit****Number    Description**

|             |  |
|-------------|--|
| 3.1         | Certificate of Change filed with the Nevada Secretary of State on July 14, 2016 (incorporated by reference to Exhibit 3.1 to the Company's Form 8-K filed on July 20, 2016)  |
| 3.2         | Certificate of Designation of Non-Voting Series A Convertible Preferred Stock of Lightbridge Corporation (incorporated by reference to Exhibit 3.1 to the Company's Form 8-K filed on August 3, 2016)                    |
| 3.3         | Amended and Restated Bylaws of Lightbridge Corporation (incorporated by reference to Exhibit 3.1 to the Company's Form 8-K filed on August 29, 2016)   |
| 10.1        | Investors Rights Agreement, dated August 2, 2016, between Lightbridge Corporation and General International Holdings, Inc. (incorporated by reference to Exhibit 10.1 to the Company's Form 8-K filed on August 3, 2016) |
| <u>31.1</u> | <u>Rule 13a-14(a)/15d-14(a) Certification - Principal Executive Officer</u>  |
| <u>31.2</u> | <u>Rule 13a-14(a)/15d-14(a) Certification - Principal Financial Accounting Officer</u>   |
| <u>32</u>   | <u>Section 1350 Certifications</u>   |
| 101.INS     | XBRL Instance Document   |
| 101.SCH     | XBRL Taxonomy Extension Schema Document  |
| 101.CAL     | XBRL Taxonomy Extension Calculation Linkbase Document  |
| 101.DEF     | XBRL Taxonomy Extension Definition Linkbase Document   |
| 101.LAB     | XBRL Taxonomy Extension Label Linkbase Document  |
| 101.PRE     | XBRL Taxonomy Extension Presentation Linkbase Document   |