



**ATOMIC ENERGY OF CANADA LIMITED**

# **Third Quarter Financial Report**

**Consolidated Financial Statements (Unaudited)**

**As at and for the three and nine months ended  
December 31, 2016 and December 31, 2015**

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# MESSAGE FROM THE PRESIDENT AND CHIEF EXECUTIVE OFFICER

A little over a year ago, the restructuring of AECL was finalized with the implementation of a Government-owned, Contractor-operated (GoCo) model at our sites. This new model, similar to the one used in the United States and United Kingdom in the management of their nuclear sites, was meant to bring greater efficiencies and effectiveness, and reduce risks and costs for Canadian taxpayers. While the GoCo model fundamentally changed *how* we do things, it did not change *what* we do: enable nuclear science and technology and manage Canada's radioactive waste liabilities.

Today, AECL's sites are managed by Canadian Nuclear Laboratories (CNL). With over 3,000 employees across Canada, CNL and its new management team are well placed to bring about the necessary change in how our sites are managed, increase efficiencies and bring greater value for Canada. AECL is leveraging international best practices and private-sector expertise in decommissioning and waste management, as well as science and technology, to help us deliver our mandate.

As we continue our journey under the GoCo model, we continue to see evidence of transformation at our sites, both from a skyline perspective – old buildings are coming down and new ones are being erected – as well as behind the scenes where streamlined processes are being implemented to improve efficiencies while ensuring continued safety.

This report highlights some of the significant progress accomplished during the third quarter of 2016-17 by CNL through the GoCo model. CNL continues to make good progress in achieving milestones and targets as per agreed-upon plans - tackling complex decommissioning challenges and advancing nuclear science and technology for the benefit of Canada and Canadians. In its oversight role, AECL sets priorities and assesses CNL's performance, with a view of ensuring that our overall mandate is achieved in the most efficient and effective manner. We continue to look to CNL to leverage the existing capabilities that our sites offer, along with the expertise that has been developed over many decades, to make CNL a world-class nuclear science and technology organization which safely addresses our radioactive waste liabilities to reduce risks and costs.



Richard Sexton  
President and Chief Executive Officer

# MANAGEMENT'S NARRATIVE DISCUSSION

## Introduction

Management's Narrative Discussion is intended to provide the reader with a greater understanding of AECL's business, its business strategy and performance, its expectations for the future, and how it manages risk and capital resources. It is also intended to enhance the understanding of the unaudited consolidated financial statements for the third quarter of 2016-17 and accompanying notes. Management's Narrative Discussion should therefore be read in conjunction with these documents.

Unless otherwise indicated, all financial information presented in Management's Narrative Discussion, including tabular amounts, is in Canadian dollars and is prepared in accordance with Public Sector Accounting Standards (PSAS).

Management's Narrative Discussion was authorized for issue by the Board of Directors on February 16, 2017.

## Our Business

Reporting to Parliament through the Minister of Natural Resources, AECL is a federal Crown corporation with the mandate to enable nuclear science and technology and fulfill Canada's radioactive waste and decommissioning responsibilities. AECL delivers its mandate through a long-term, contractual arrangement with Canadian National Energy Alliance (CNEA) for the management and operation of Canadian Nuclear Laboratories (CNL) under a Government-owned, Contractor-operated model.

AECL employs 43 employees located in Pinawa, Manitoba as well as Port Hope, Ottawa, and Chalk River, Ontario. As of December 31, 2016, CNL employs over 3,500 employees at 12 AECL sites across Canada, with most employees located at the Chalk River Laboratories, in Chalk River, Ontario.

AECL's objective is to provide effective oversight of the Government-owned, Contractor-operated contract with the private-sector and to ensure that the objectives of government are met. It sets priorities for CNL, oversees the contract and assesses performance to ensure value for money for Canada. There are two main areas of focus:

1. Decommissioning and Waste Management

To safely and efficiently reduce the Government of Canada's radioactive waste liabilities. Through the Government-owned, Contractor-operated model, AECL leverages the expertise and experience of CNL to bring innovative solutions to infrastructure decommissioning, site remediation and radioactive waste management at AECL sites and other sites for which the government has accepted responsibility.

## 2. Nuclear Laboratories

Through the work of CNL, enable the provision of technical and research and development products and services in support of: (i) Canada's federal roles, responsibilities and priorities; (ii) commercial services for third parties, and (iii) the other activities of CNL. Nuclear science and technology activities are conducted at the Chalk River Laboratories, which is Canada's largest science and technology complex. AECL also supports CNL in developing and building science and technology capabilities at the Chalk River Laboratories in a cost-effective manner. Activities at the Nuclear Laboratories also include capital investments to renew and revitalize the Chalk River site to enhance CNL's capabilities to provide safe and world-class nuclear science and technology and other nuclear services.

## **Third Quarter Highlights for 2016-17**

### **Decommissioning and Waste Management**

CNL is addressing AECL's radioactive waste and decommissioning liability, which represents the estimated costs of cleaning-up existing waste areas, safely decontaminating, demolishing and disposing of contaminated buildings and facilities, and remediating affected land, as appropriate. AECL's objective is to leverage the expertise and experience of CNL and its parent affiliate companies to cost effectively reduce risks and liabilities for Canada in a manner that is consistent with international best practices.

For example, AECL's Chalk River site includes multiple buildings and facilities which require decontamination, decommissioning and demolition. Most of these facilities and buildings are no longer needed to meet operational needs and contribute to high site costs through ongoing maintenance, footprint, energy consumption, etc. CNL is continuing to meet milestones for the decommissioning of a number of these facilities at the site.

CNL's planning activities for a Near Surface Disposal Facility at the Chalk River Laboratories are on schedule. This facility will allow CNL to permanently dispose of AECL's contaminated materials, legacy wastes and reduce associated long-term storage and surveillance costs. CNL has completed 60% of the design work and continues to actively engage local stakeholders and First Nation communities. A second round of public information sessions was held over the fall and several stakeholders were briefed on the project as part of the Environmental Assessment process currently underway.

Scheduled transfers of stored fuel to the new Fuel Packaging & Storage Facility were completed ahead of schedule. This facility is used to safely store degraded fuel removed from existing tile holes (below ground storage) and safely place them in an above-ground storage facility. CNL successfully and safely retrieved, transferred, and repackaged, the used fuel in the new storage in order to reduce environmental hazards.

Highly enriched uranium originating in the United States has been used at the Chalk River site primarily in the production of the medical isotope molybdenum-99. This material requires high levels of security as well as costly and complicated storage. As part of the Global Threat Reduction Initiative (an initiative which aims at reducing proliferation risks by consolidating highly-enriched uranium inventories in fewer locations around the world), AECL is working with the United States Department of Energy and

CNL to return (repatriate) this material to the United States for conversion and reuse. This initiative provides for a safe, secure, timely and permanent solution to Canada's long-term management of this material. Shipments of fuel rods containing highly-enriched uranium to the Savannah River site in the United States were completed for the year as per targets.

Work also continued to decommission the Whiteshell Laboratory site in Manitoba, and the Nuclear Power Demonstration reactor in Ontario. In both cases, CNL is undergoing an Environmental Assessment for its proposal for *in situ* decommissioning (i.e. by immobilizing and leaving them in place) of the research and demonstration reactors. The proposals to decommission the reactors *in situ* is in line with international best practice and provides a safe, environmentally sound, and more cost effective approach to address AECL's liability when compared with the removal and disposal of contaminated reactor components. As part of the Environmental Assessment process, CNL continued its work to develop the required safety and environmental analysis for submission to the Canadian Nuclear Safety Commission. It also conducted a second round of public information sessions and has been reaching out to Aboriginal communities in the areas.

Finally, at the Port Hope Area Initiative, where historic low-level radioactive waste in the municipalities of Port Hope and Clarington is being cleaned up, CNL continued with site preparation, construction and waste emplacement. The Port Hope Area Initiative is delivering on Canada's long-term commitment to clean up low-level radioactive waste in the community, restore historically contaminated lands and safely manage radioactive waste.

## **Nuclear Laboratories**

On behalf of AECL, CNL delivers the Federal Nuclear Science and Technology Work Plan to support federal departments and agencies in their responsibilities as they relate to nuclear science and technology. This includes work in support of federal responsibilities in the areas of health protection, energy, public safety, security, emergency management and environmental protection. To date, all project milestones related to the Federal Nuclear Science and Technology Work Plan have been achieved on time.

CNL is also tasked with leveraging the facilities, capabilities and expertise at the Chalk River Laboratories to support industry and commercial customers. It provides nuclear science and technology services to industry on a cost-recovery basis; commercial margins in Q3 were ahead of plans on a year-to-date basis and margins at year end are also projected to exceed targets.

As part of its responsibilities for managing and operating AECL's sites, CNL operates the National Research Universal (NRU) reactor, Canada's largest nuclear research reactor located at the Chalk River Laboratories. In October 2016, CNL ceased the routine production of the key medical isotope molybdenum-99 from the NRU reactor. This is aligned with the Government of Canada's strategy which, since 2010 has been to cease the production of molybdenum-99 (Mo-99) from the NRU in October 2016. In early 2015, the Government of Canada asked AECL, as a contingency, to retain the capacity to produce Mo-99 between October 2016 and March 2018 in case of a worldwide shortage. The NRU continues to be fully operational during this 'contingency period' for other purposes, and as such, production of Mo-99 could be resumed rapidly to address a significant, prolonged shortage.

That said, the global outlook for medical isotopes has improved over recent years. The latest projections from the Organisation for Economic Cooperation and Development (OECD) and the Association of Imaging Producers and Equipment Suppliers indicate that the global supply of Mo-99 is expected to be sufficient to meet global demand over the coming years. This includes sufficient normal 'buffer' supply to address unexpected shortages, even without the NRU.

Finally, CNL continues to make progress with the important renewal and refurbishment of the Chalk River Laboratories. Activities in support of this initiative included ongoing projects, as well as planning for the next decade of capital investments to support the ongoing science and technology mission and to transform the site towards a right-sized, sustainable and world-class science campus. Progress during Q3 included:

- Installation of a natural gas pipeline and conversion of the site Powerhouse and other key facilities on the Chalk River site are proceeding ahead of schedule, with CNL proposing to bring some facility conversions forward from next year. The conversion to natural gas will substantially reduce the operating cost of the Chalk River site.
- Repurposing of Building 215 to accommodate the Tritium laboratory is proceeding as planned to enable vacating the existing building which does not effectively meet modern requirements. This facility upgrade will provide a new laboratory environment, to leverage existing capabilities, and grow CNL's science and technology stature.
- Installation of a supply of domestic water is proceeding ahead of schedule and will address current deficiencies with the supply of potable water for food preparation, sanitary and personal facilities and safe drinking water at the Chalk River site and to conform to current provincial and/or federal standards.

## **Financial Overview**

AECL's third quarter financial results reflected a surplus of \$25 million compared to an \$18 million deficit in the same period of the previous year.

The Government of Canada provides funding for AECL to advance its priorities and deliver on its mandate. Funding of \$168 million for the third quarter of 2016-17 was drawn from Parliamentary appropriations.

AECL's planned activities are set out in its Corporate Plan. The 2016-17 year-to-date results are generally comparable to the planned results, and as such, AECL is on track to meet its commitments within budget. Priorities and deliverables have not materially changed in the first nine months of 2016-17.

## Forward-Looking Statements

This Management's Narrative Discussion has been reviewed by AECL's Audit Committee and approved by AECL's Board of Directors. It provides comments on the performance of AECL for the quarter ended December 31, 2016, and should be read in conjunction with the unaudited consolidated financial statements and accompanying notes.

The Management's Narrative Discussion contains forward-looking statements with respect to AECL based on assumptions that Management considers reasonable at the time of preparation. These forward-looking statements, by their nature, necessarily involve risks and uncertainties that could cause future results to differ materially from current expectations. We caution the reader that the assumptions regarding future events, many of which are difficult to predict, may ultimately require revision.

## Financial Review

(\$ millions)	Three Months Ended		Nine Months Ended	
	December 31,		December 31,	
	2016	2015	2016	2015
<b>Revenues</b>				
Parliamentary appropriations	\$ 168	\$ 135	\$ 498	\$ 315
Commercial revenue	21	35	85	82
Interest income	1	2	4	4
Other funding	-	-	-	100
	<b>\$ 190</b>	<b>\$ 172</b>	<b>\$ 587</b>	<b>\$ 501</b>
<b>Expenses</b>				
Cost of sales	\$ 12	\$ 23	\$ 59	\$ 61
Operating expenses	13	14	34	161
Contractual expenses	79	85	242	96
Finance expenses	72	63	215	189
Revaluation (gain) loss on decommissioning and waste management provision and other	(11)	-	(11)	-
Wrap-Up Office activities	-	5	3	8
	<b>\$ 165</b>	<b>\$ 190</b>	<b>\$ 542</b>	<b>\$ 515</b>

## Parliamentary Appropriations

AECL receives Parliamentary appropriations to deliver on its missions and priorities. AECL recognized \$168 million of Parliamentary appropriations in the third quarter of 2016-17, compared to \$135 million for the same period in 2015-16. On a year-to-date basis, AECL recognized \$498 million of Parliamentary



appropriations, compared to \$315 million for the same period in 2015-16. The variances are primarily related to the fact that, following the implementation of the Government-owned, Contractor-operated model, AECL receives Parliamentary appropriations directly for delivering on its decommissioning and waste management mandate. In 2015-16, this funding was provided to AECL by Natural Resources Canada, and as such, was recognized by AECL as 'Other funding'.

## **Commercial Revenue**

In the third quarter of 2016-17, \$21 million in revenue was generated related to isotope sales, commercial science and technology sales and services, nuclear waste management, and heavy water sales, compared to \$35 million for the same period in 2015-16. On a year-to-date basis, revenues were \$85 million, compared to \$82 million in the first nine months of 2015-16. The reported decrease in the third quarter can be attributed primarily to decreased isotope sales in the period.

## **Interest Income**

Interest income is earned on long-term receivables, investments held in trust and on cash. Income earned in the quarter and year-to date are comparable to the prior period.

## **Other Funding**

AECL fulfills Canada's obligations to address legacy waste liabilities associated with AECL sites and historic low-level radioactive wastes for which Canada has accepted responsibility through the Low-Level Radioactive Waste Management Office and the Port Hope Area Initiative. Up to September 13, 2015, when the Government-owned, Contractor-operated model came into effect, AECL received funding from Natural Resources Canada for the related work being delivered by CNL and reported the funding received as 'Other Funding'. As of September 13, 2015, AECL assumed responsibility for fulfilling the Government's obligations with respect to these various waste liabilities. In 2016-17, funding for those activities is provided directly to AECL through Parliamentary appropriations.

## **Cost of Sales**

Cost of sales are consistent with the Commercial revenue noted above.

## **Operating Expenses and Contractual Expenses**

With the implementation of the Government-owned, Contractor-operated model, AECL now delivers its mandate through a long-term contract with CNL and the private sector for the management and operation of its sites. Prior to that date, CNL expenditures were reported as Operating expenses as CNL was at the time a wholly-owned subsidiary of AECL. Subsequent to that date, CNL-related expenditures have been reported by AECL as Contractual expenses. Expenditures in this category for the third quarter, which also include AECL's own oversight expenses, total \$92 million, compared to expenses of a similar nature of \$99 million in the third quarter of 2015-16. On a year-to-date basis, operating expenses and contractual expenditures were \$276 million in 2016-17 compared to \$257 million for the same period in 2015-16.

## Financial Expenses

Financial expenses include the increase in the net present value of the decommissioning and waste management provision. Financial expenses in the third quarter of 2016-17 of \$72 million were higher than the \$63 million reported during the same period in 2015-16. On a year-to-date basis, financial expenses were \$215 million compared to \$189 million in 2015-16. These variances are due to the increase of the reported liability as a result of the transfer of the contaminated sites liability associated with the Port Hope Area Initiative to AECL from Natural Resources Canada during 2015-16.

## Revaluation (Gain) Loss on Decommissioning and Waste Management Provision and Other

Revisions in estimate and timing of expenditures in the third quarter of 2016-17 have created a small gain on the Decommissioning and waste management provision.

## Wrap-Up Office Activities

At the date of the divestiture of the assets of its commercial division to Candu Energy Inc. in 2011, AECL retained certain liabilities. These are being managed by the Wrap-up Office. Operating expenses for the Wrap-up Office include the cost of staff and third-party service providers to address the retained liabilities. These activities continue to be wound down as planned.

## Consolidated Cash Flow and Working Capital

(\$ millions)	Three Months Ended		Nine Months Ended	
	December 31,		December 31,	
	2016	2015	2016	2015
Cash from operating activities	\$ 50	\$ 62	\$ 272	\$ 247
Cash used in capital activities	(34)	(44)	(116)	(109)
<b>Cash</b>				
Increase (Decrease)	16	18	156	138
Balance at beginning of the period	224	196	84	76
<b>Balance at end of the period</b>	<b>\$ 240</b>	<b>\$ 214</b>	<b>\$ 240</b>	<b>\$ 214</b>

Overall, AECL's closing cash position for the third quarter of 2016-17 increased to \$240 million compared to the balance at the close of the third quarter of 2015-16 of \$214 million.

## Operating Activities

Operating activities generated a net cash inflow of \$50 million in the third quarter of 2016-17, compared to \$62 million during the same period in 2015-16. On a year-to-date basis, operating activities resulted in a net cash inflow of \$272 million compared to \$247 million during the same period the previous year. The variance in the year-to-date is primarily related to increased appropriations received in 2016-17 due to the timing of cash outlays in both periods.

## Capital Activities

Capital activities used cash of \$34 million in the third quarter of 2016-17 compared to \$44 million used in the same period in 2015-16. On a year-to-date basis, capital activities used cash of \$116 million compared to \$109 million used in the same period as the previous year. The year-to-date increase is primarily due to the accelerated construction activities for a new laboratory complex at the Chalk River Laboratories site.

## Highlights of the Consolidated Statements of Financial Position

<i>(\$ millions)</i>	<b>December 31, 2016</b>	March 31, 2016	Variance In \$	Variance By %
Financial Assets	\$ 590	\$ 481	\$ 109	23%
Liabilities	8,496	8,324	172	2%
Non-Financial Assets	592	506	86	17%
Accumulated Deficit	(7,314)	(7,337)	23	0%

AECL closed the third quarter of 2016-17 with Financial Assets of \$590 million, which represents a \$109 million variance from March 31, 2016. This variance is mainly the result of increased cash received from Parliamentary appropriations for the anticipated contractual expenditures to CNL that was treated as Deferred funding.

The increase in Liabilities of \$172 million can be attributed primarily to the increase in Deferred funding.

The increase in Non-Financial Assets of \$86 million is mainly a result of increased spending toward tangible capital assets.

## Management of Risks and Uncertainties

Risks and uncertainties are described in AECL's 2015-16 Annual Financial Report under the section "Management's Discussion and Analysis." Risks and uncertainties and risk management practices as noted in the 2015-16 Annual Financial Report have not materially changed in the first nine months of 2016-17.

## MANAGEMENT'S RESPONSIBILITY

Management is responsible for the preparation and fair presentation of these consolidated quarterly financial statements in accordance with the Treasury Board of Canada "Standard on Quarterly Financial Reports for Crown Corporations," and for such internal controls as Management determines is necessary to enable the preparation of consolidated quarterly financial statements that are free from material misstatement. Management is also responsible for ensuring all other information in this quarterly financial report is consistent, where appropriate, with the consolidated quarterly financial statements.

Based on our knowledge, these unaudited consolidated quarterly financial statements present fairly, in all material respects, the financial position, results of operations and cash flows of the Corporation, as at the date of and for the periods presented in the consolidated quarterly financial statements.



**Richard Sexton**

*President and Chief Executive Officer*

March 1, 2017

Chalk River, Canada



**David Smith**

*Chief Financial Officer*

March 1, 2017

Chalk River, Canada

# UNAUDITED CONSOLIDATED FINANCIAL STATEMENTS

## Consolidated Statements of Financial Position (Unaudited)

<i>(thousands of Canadian dollars)</i>	Notes	December 31, 2016	March 31, 2016	April 1, 2015
<b>Financial Assets</b>				
Cash		240,546	84,553	75,912
Long-term disposal of waste fund		14,423	3,538	-
Investments held in trust		49,569	49,320	47,805
Trade and other receivables	5	31,593	54,552	59,581
Long-term receivables		44,280	68,579	99,794
Inventory		6,084	7,242	25,884
Heavy Water Inventory		204,082	212,968	221,283
		<b>590,577</b>	<b>480,752</b>	<b>530,259</b>
<b>Liabilities</b>				
Accounts payable and accrued liabilities	6	71,569	62,926	133,666
Employee future benefits	7	26,372	27,898	35,798
Due to Canadian Nuclear Laboratories		121,475	114,287	-
Deferred funding		191,407	-	-
Deferred decommissioning and waste management funding		263,192	245,011	220,510
Decommissioning and waste management provision	8	6,764,148	6,763,423	6,487,228
Contaminated sites liability	9	1,057,414	1,109,493	-
Customer advances and obligations		501	909	3,165
		<b>8,496,078</b>	<b>8,323,947</b>	<b>6,880,367</b>
<b>Net Financial Debt</b>		<b>(7,905,501)</b>	<b>(7,843,195)</b>	<b>(6,350,108)</b>
<b>Non-Financial Assets</b>				
Tangible capital assets	10	591,614	505,487	410,558
Prepaid expenses		10	430	3,486
		<b>591,624</b>	<b>505,917</b>	<b>414,044</b>
<b>Accumulated Deficit</b>		<b>(7,313,877)</b>	<b>(7,337,278)</b>	<b>(5,936,064)</b>
Accumulated deficit is comprised of:				
Accumulated operating deficit		(7,314,439)	(7,337,278)	(5,936,064)
Accumulated remeasurement gains (losses)		562	-	-
		<b>(7,313,877)</b>	<b>(7,337,278)</b>	<b>(5,936,064)</b>

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

## Consolidated Statements of Operations and Accumulated Deficit (Unaudited)

<i>(thousands of Canadian dollars)</i>	Notes	2016-17	Three Months Ended		Nine Months Ended	
		Budget	December 31, 2016	December 31, 2015	December 31, 2016	December 31, 2015
<b>Revenues</b>						
Parliamentary appropriations	11	689,049	<b>167,980</b>	134,780	<b>498,296</b>	314,980
Commercial revenue		67,500	<b>20,817</b>	35,530	<b>85,145</b>	81,864
Interest income		5,800	<b>729</b>	1,560	<b>3,886</b>	4,043
Other funding	11	-	-	49	-	99,737
		762,349	<b>189,526</b>	171,919	<b>587,327</b>	500,624
<b>Expenses</b>						
Cost of sales		37,125	<b>11,796</b>	22,592	<b>58,409</b>	60,822
Operating expenses		47,000	<b>12,502</b>	14,295	<b>33,622</b>	160,922
Contractual expenses	12	327,347	<b>79,384</b>	85,659	<b>241,546</b>	95,796
Finance expenses		198,592	<b>71,699</b>	62,918	<b>215,097</b>	188,754
Revaluation (gain) loss on decommissioning and waste management provision and other		-	<b>(10,502)</b>	-	<b>(10,502)</b>	-
Realized (gain) loss on Portfolio investments		-	<b>(144)</b>	-	<b>(144)</b>	-
Wrap-Up Office activities		6,800	<b>(218)</b>	4,691	<b>3,419</b>	8,265
		616,864	<b>164,517</b>	190,155	<b>541,447</b>	514,559
<b>Surplus (Deficit) for the period</b>		145,485	<b>25,009</b>	(18,236)	<b>45,880</b>	(13,935)
<b>Accumulated operating deficit, beginning of period</b>		(7,337,278)	<b>(7,331,208)</b>	(5,948,467)	<b>(7,337,278)</b>	(5,936,064)
Transfer to deferred decommissioning and waste management funding		(24,501)	<b>(5,930)</b>	(5,930)	<b>(18,181)</b>	(18,181)
Transfer to repayable contributions		-	<b>(1,010)</b>	(2,601)	<b>(3,560)</b>	(7,055)
Transfer to remeasurement gains (losses) upon adoption of PSAS		-	<b>(1,300)</b>	-	<b>(1,300)</b>	-
<b>Accumulated operating deficit, end of period</b>		(7,216,294)	<b>(7,314,439)</b>	(5,975,234)	<b>(7,314,439)</b>	(5,975,235)

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

## Consolidated Statement of Remeasurement Gains and Losses (Unaudited)

December 31,  
2016

*(thousands of Canadian dollars)*

<b>Accumulated remeasurement gains (losses) upon adoption of PSAS, beginning of period</b>	<b>1,300</b>
<b>Remeasurement gains (losses) arising during the period</b>	
Unrealized gains (losses) on Portfolio investments	(594)
<b>Reclassifications to the statement of operations</b>	
Realized (gains) losses on Portfolio investments	(144)
<b>Net remeasurement gains (losses) for the period</b>	<b>(738)</b>
<b>Accumulated remeasurement gains (losses), end of period</b>	<b>562</b>

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

## Consolidated Statements of Change in Net Financial Debt (Unaudited)

<i>(thousands of Canadian dollars)</i>	Notes	2016-17 Budget	Three Months Ended December 31,		Nine Months Ended December 31,	
			2016	2015	2016	2015
<b>Surplus (deficit) for the period</b>		145,485	<b>25,009</b>	(18,236)	<b>45,880</b>	(13,935)
<b>Tangible capital assets</b>						
Acquisition of tangible capital assets	10	(167,600)	<b>(37,095)</b>	(41,393)	<b>(106,616)</b>	(116,578)
Amortization of tangible capital assets	10	24,000	<b>7,950</b>	6,010	<b>20,263</b>	17,064
Disposal of tangible capital assets	10	-	<b>88</b>	-	<b>226</b>	-
		(143,600)	<b>(29,057)</b>	(35,383)	<b>(86,127)</b>	(99,514)
<b>Non-financial assets</b>						
Changes in prepaid expenses		-	<b>597</b>	26	<b>420</b>	3,484
<b>Net remeasurement gains (losses) for the period</b>		-	<b>562</b>	-	<b>562</b>	-
<b>Decrease (increase) in net debt</b>		1,885	<b>(2,889)</b>	(53,593)	<b>(39,265)</b>	(109,965)
<b>Net debt at beginning of period</b>		(7,843,195)	<b>(7,894,372)</b>	(6,423,184)	<b>(7,843,195)</b>	(6,350,108)
Transfer to deferred decommissioning and waste management funding		(24,501)	<b>(5,930)</b>	(5,930)	<b>(18,181)</b>	(18,181)
Transfer to repayable contributions		-	<b>(1,010)</b>	(2,601)	<b>(3,560)</b>	(7,055)
Transfer to remeasurement gains (losses) upon adoption of PSAS		-	<b>(1,300)</b>	-	<b>(1,300)</b>	-
<b>Net debt at end of period</b>		(7,865,811)	<b>(7,905,501)</b>	(6,485,308)	<b>(7,905,501)</b>	(6,485,309)

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



## Consolidated Statements of Cash Flows (Unaudited)

	Three Months Ended December 31,		Nine Months Ended December 31,	
<i>(thousands of Canadian dollars)</i>	2016	2015	2016	2015
<b>Operating transactions</b>				
Cash receipts from Parliamentary appropriations	191,407	176,082	689,703	471,664
Cash receipts from customers	38,519	28,810	134,237	115,338
Cash receipts for decommissioning and waste management activities	-	11,158	-	111,368
Cash paid to suppliers	(100,275)	(103,691)	(285,887)	(199,398)
Cash paid to employees	(1,892)	(2,483)	(10,915)	(106,028)
Cash paid for decommissioning activities	(78,505)	(48,645)	(255,949)	(146,117)
Interest received	337	201	800	570
<b>Cash provided by operating transactions</b>	<b>49,591</b>	<b>61,432</b>	<b>271,989</b>	<b>247,397</b>
<b>Capital transactions</b>				
Acquisition of tangible capital assets	(33,561)	(43,733)	(115,996)	(109,222)
<b>Cash applied to capital transactions</b>	<b>(33,561)</b>	<b>(43,733)</b>	<b>(115,996)</b>	<b>(109,222)</b>
<b>Increase (decrease) in cash and cash equivalents</b>	<b>16,030</b>	<b>17,699</b>	<b>155,993</b>	<b>138,175</b>
<b>Cash and cash equivalents at beginning of period</b>	<b>224,516</b>	<b>196,388</b>	<b>84,553</b>	<b>75,912</b>
<b>Cash and cash equivalents at end of period</b>	<b>240,546</b>	<b>214,087</b>	<b>240,546</b>	<b>214,087</b>

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

# NOTES TO THE CONSOLIDATED FINANCIAL STATEMENTS

## For the three and nine months ended December 31, 2016

(Expressed in thousands of Canadian dollars)

(Unaudited)

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### 1. The Corporation

Atomic Energy of Canada Limited (AECL) is a federal Crown corporation whose mandate is to fulfill the Government's waste and decommissioning responsibilities, provide nuclear expertise to support federal roles and responsibilities, and offer services to users of the Nuclear Laboratories on commercial terms. AECL delivers its mandate through a long-term contract with Canadian National Energy Alliance (CNEA) for the management and operation of Canadian Nuclear Laboratories (CNL) under a Government-owned, Contractor-operated model. This contract came into effect on September 13, 2015. Prior to this date, CNL operated as a wholly-owned subsidiary of AECL.

AECL also manages the retained liabilities associated with its former CANDU Reactor Division (Commercial Operations), the assets of which were sold to Candu Energy Inc., a wholly-owned subsidiary of SNC-Lavalin, on October 2, 2011.

AECL was incorporated in 1952 under the provisions of the *Canada Corporations Act* (and continued in 1977 under the provisions of the *Canada Business Corporations Act*), pursuant to the authority and powers of the Minister of Natural Resources under the *Nuclear Energy Act*. AECL is a Schedule III Part I Crown corporation under the *Financial Administration Act* and an agent of Her Majesty in Right of Canada. As a result, AECL's liabilities are ultimately liabilities of Her Majesty in Right of Canada. AECL receives funding from the Government of Canada and is exempt from income taxes in Canada.

### 2. Restructuring and Corporate Plan

The Government of Canada has restructured AECL to reduce risks and costs to Canadian taxpayers. The first phase of the restructuring was completed in 2011 with the sale of the assets of AECL's CANDU Reactor Division (Commercial Operations).

The second phase of the restructuring focused on AECL's Nuclear Laboratories, with the objective of implementing a Government-owned, Contractor-operated business model. As part of the implementation of this model, AECL incorporated a wholly-owned subsidiary, CNL. In November 2014, virtually all of AECL's employees were transferred to CNL, and CNL became the operator of the Nuclear Laboratories. AECL proceeded to establish itself as a small organization to provide oversight of the contractual arrangement under this model.

In June 2015, following a procurement process led by Natural Resources Canada and Public Works and Government Services Canada, the Government of Canada announced that CNEA had been selected as the preferred bidder to manage and operate CNL. The contract with CNEA came into effect on September 13, 2015, and the shares of CNL were transferred from AECL to CNEA. Under this contractual arrangement, AECL retains ownership of the sites, facilities and assets and provides funding to CNL to manage and operate the sites and to undertake the program of work to fulfill AECL's mandate. This includes the provision of services to third party customers on behalf of AECL. With the transition to the Government-owned, Contractor-operated business model, the restructuring of AECL is now complete.

AECL's 2016-2017 to 2020-2021 Corporate Plan received Governor in Council approval in the first quarter of the 2016-17 fiscal year. The Corporate Plan is aligned with the restructuring direction provided by the Shareholder and reflects AECL's new role under the Government-owned, Contractor-operated model.

### **3. Significant Accounting Policies**

#### **a) Adoption of New Accounting Standards**

Effective April 1, 2016, AECL adopted the Public Sector Accounting Standards (PSAS). See Note 4 for more details.

#### **b) Basis of Accounting**

These consolidated financial statements have been prepared in accordance with Canadian Public Sector Accounting Standards (PSAS) established by the Public Sector Accounting Board (PSAB), and reflect the policies below.

These consolidated quarterly financial statements should be read in conjunction with the annual audited consolidated financial statements dated March 31, 2016, as well as Note 4 relating to the transition to Public Sector Accounting Standards.

Both financial and non-financial assets are reported on the Statement of Financial Position. Non-financial assets are normally employed to provide future services, and are charged to expense through amortization or upon utilization. Non-financial assets are not taken into consideration when determining the net financial assets, but rather are added to the net financial assets (or debt) to determine the accumulated surplus (deficit).

#### *Measurement Uncertainty*

The preparation of the consolidated financial statements in accordance with PSAS requires management to make estimates and assumptions that affect the reported amounts of financial assets, liabilities and non-financial assets at the date of the financial statements, and the reported amounts of revenue and expenses during the reporting period. Items requiring the use

of significant estimates and assumptions include those related to the fair value of financial instruments, useful life and write-down of tangible capital assets, employee future benefits, contingent liabilities and provisions including the decommissioning and waste management provision and contaminated sites liability. Estimates and assumptions are based on the best information available at the time of preparation of the consolidated financial statements and are reviewed annually to reflect new information as it becomes available. Where actual results differ from these estimates and assumptions, the impact will be recorded in future periods when the difference becomes known.

### *Budget Figures*

The 2016-17 budget is reflected in the Consolidated Statements of Operations and Accumulated Deficit and the Consolidated Statements of Change in Net Financial Debt. Budget data presented in these consolidated financial statements is based upon the 2016-17 projections and estimates contained within the 2016-17 to 2020-21 Corporate Plan.

Budget figures have not been audited, and are presented for information purposes.

## **c) Financial Instruments**

AECL's cash, trade and other receivables, long-term disposal of waste fund, long-term receivables, trade and other payables, customer advances and obligations, and due to Canadian Nuclear Laboratories are measured at amortized cost. Transaction costs are a component of cost for financial instruments measured using cost or amortized cost. Transaction costs are expensed for financial instruments measured at fair value.

AECL has elected to measure investments held in trust at fair value, to correspond with how it is evaluated and managed. These financial instruments are not reclassified for the duration of the period they are held. Unrealized gains and losses from changes in the fair value of financial instruments are recognized in the Consolidated Statements of Remeasurement Gains and Losses. Upon settlement, the cumulative gain or loss is reclassified from the Consolidated Statements of Remeasurement Gains and Losses and recognized in the Consolidated Statements of Operations and Accumulated Deficit. Interest and dividends attributable to financial instruments are reported in the Consolidated Statements of Operations and Accumulated Deficit.

## **d) Employee Future Benefits**

Substantially all of the employees of AECL are covered by the Public Service Pension Plan (PSPP), a contributory defined benefit plan established through legislation and sponsored by the Government of Canada. Contributions are required by both the employees and AECL to cover current service cost.

Pursuant to legislation currently in place, AECL has no legal or constructive obligation to pay further contributions with respect to any past service or funding deficiencies of the PSPP.

Consequently, contributions are recognized as an expense in the year when employees have rendered service and represent the total pension obligation of AECL.

AECL provides employee benefits such as voluntary termination compensation benefits and other benefits, including continuation of health and dental benefits during long-term disability, and self-insured workers' compensation.

AECL reimburses Employment and Social Development Canada for workers' compensation claims in accordance with the *Government Employees Compensation Act* for current payments billed by the provincial compensation boards.

#### *Non-Pension Post-Employment Benefit Plans*

AECL's net obligation with respect to its non-pension post-employment defined benefit plans is the amount of future benefit that employees have earned in return for their service in the current and prior periods. That benefit is discounted to determine its present value. The calculation is performed annually by a qualified actuary using the Projected Unit Credit Method prorated on service and Management's best estimate of salary escalation, retirement ages of employees, mortality and expected employee turnover.

The discount rate is based on AECL's cost of borrowing as determined based on long-term Government of Canada bond yields. The Corporation amortizes any actuarial gains and losses arising from non-pension defined benefit plans into the Consolidated Statements of Operations and Accumulated Deficit over the expected average remaining service life.

#### *Other Long-Term Employee Benefits*

AECL's net obligation with respect to other long-term employee benefits is the amount of future benefit that employees have earned in return for their service in the current and prior periods. These benefits include self-insured workers' compensation benefits and health and dental care benefits during long-term disability.

That benefit is discounted to determine its present value. The discount rate is based on the Company's cost of borrowing as determined based on long-term Government of Canada bond yields. The calculation is performed using a combination of the Projected Unit Credit Method prorated on service and event-driven calculations for Workers' Compensation. Any actuarial gains and losses are amortized into the Consolidated Statements of Operations and Accumulated Deficit over the expected average remaining service life.

#### *Short-Term Employee Benefits*

Short-term employee benefit obligations are measured on an undiscounted basis and are expensed as the related service is provided. A liability is recognized for the amount expected to be paid under short-term incentive plans if AECL has a present legal or constructive obligation to pay this amount as a result of past service provided by the employee, and if the obligation can be estimated reliably.

## **e) Decommissioning and Waste Management Provision**

AECL provides for its obligations to decommission nuclear facilities and to manage nuclear waste in order to satisfy regulatory requirements. The best estimate of an obligation is recognized in the period in which a reasonable estimate can be determined and it is probable that an outflow of economic benefits will be required to settle the obligation.

The provision takes into account current technological, environmental and regulatory requirements and is determined by discounting the expected future cash flows at a rate that reflects current market assessments of the time value of money and the risks specific to the provision. The estimated future cash forecasts are adjusted for inflation using a rate that is derived on the basis of Consensus forecasts and Bank of Canada historical and target inflation rates.

As the provision is recorded based on a discounted value of the projected future cash flows, it is increased quarterly to reflect the passage of time by removing one quarter's discount. The unwinding of the discount is charged to Finance expenses in the Consolidated Statements of Operations and Accumulated Deficit.

The provision is reduced by actual expenditures incurred. The cost estimate is subject to periodic review and any material changes in the estimated amount or timing of the underlying future cash flows are recorded as an adjustment to the provision. Upon settlement of the liability, a gain or loss will be recorded. The provision includes future construction costs associated with certain enabling facilities, such as nuclear waste processing, storage and disposal facilities.

Decommissioning costs of new assets are added to the carrying amount and amortized over the related assets' useful lives. The effect of subsequent changes in estimating an obligation for which the provision was recognized as part of the cost of the asset is adjusted against the asset.

## **f) Contaminated Sites Liability**

AECL recognizes a provision for contaminated sites when all of the following conditions are prevalent: an environmental standard exists; the level of contamination has been determined to exceed the environmental standard and AECL is directly responsible or accepts responsibility; it is expected that future economic benefits will be given up; and a reasonable estimate of the amount can be made at that time. The liability includes all material costs directly attributable to remediation activities including post remediation operations, maintenance and monitoring.

## **g) Tangible Capital Assets**

Tangible capital assets are recorded at cost less accumulated amortization, which includes amounts that are directly related to the acquisition, design, construction, development, improvement or betterment of the assets. Cost includes overhead directly attributable to the

construction and development, as well as the asset retirement obligation costs of dismantling and removing the items and restoring the site on which they are located.

Contributions in Aid of Construction relate to the contributions made for a pipeline to deliver natural gas to the Chalk River Site.

The cost of tangible capital assets in use is amortized on a straight-line basis over the estimated useful life, as follows:

<b>Asset</b>	<b>Rate</b>
Land Improvements	10-20 years
Buildings	20-40 years
Reactors	20-40 years
Machinery & Equipment	3-25 years
Software Costs	3 years
Contributions in Aid of Construction	40 years

Construction in progress represents assets that are not yet available for use and therefore are not subject to amortization. When complete, the constructed asset is transferred to the appropriate category of tangible capital asset and amortized at the rate applicable to that category. Amortization commences when the asset is put into use and ceases when it no longer provides any further economic benefit to AECL or when it is no longer in service.

When conditions indicate that a tangible capital asset no longer contributes to AECL's ability to provide goods and services, or that the value of future economic benefits associated with the tangible capital asset is less than its net book value, the cost of the tangible capital asset is reduced to reflect the decline in the asset's value. The net write-down is then accounted for as an expense in the Consolidated Statements of Operations and Accumulated Deficit.

Useful lives are assessed annually and revisions to the useful life are made as required.

## **h) Parliamentary Appropriations**

AECL receives Parliamentary appropriations for operating expenditures and tangible capital assets. These Parliamentary appropriations are free of any stipulations limiting their use, and are recorded as funding from the Government of Canada in the Consolidated Statements of Operations and Accumulated Deficit, up to the authorized amount, where eligibility criteria have been met.

## **4. Transition to Public Sector Accounting Standards**

Effective April 1, 2016, AECL adopted Canadian Public Sector Accounting Standards (PSAS). These amended standards were adopted with retrospective restatement, and therefore the

2015-16 comparative figures have been restated. Key adjustments resulting from the adoption of these accounting standards are as follows:

### **a) Tangible Capital Assets**

Computer software and contributions in aid of construction are included in the definition of a tangible capital asset under PSAS. The March 31, 2016 financial statements have been revised to reclassify computer software and contributions in aid of construction of \$18.3 million, previously recorded as an intangible asset, to tangible capital assets. This reclassification did not result in any adjustments to AECL's accumulated surplus (deficit) or annual surplus (deficit), or the Statement of Cash Flow.

Under PSAS, the discount rate applied to any Asset Retirement Obligations should be based on the Government's cost of borrowing. The adjustment to the tangible capital assets is reflected in AECL's accumulated deficit upon transition.

AECL decided to use the first-time adopter exemption, and applied on a prospective basis from the date of transition, the condition for a write-down of a tangible capital asset. Following this application, no write-down was recognized.

### **b) Decommissioning & Waste Management Provision**

Under PSAS, the discount rate applied to determine the present value of the liability should be consistent with PSAS, and based on the Government's cost of borrowing. An adjustment to the decommissioning and waste management provision of \$3,487.0 million as of April 1, 2015 and \$3,255.1 million as of March 31, 2016 as a result of this change is reflected in AECL's accumulated deficit upon transition.

### **c) Contaminated Sites Liability**

Under PSAS, the discount rate applied to determine the present value of the liability should be consistent with PSAS, and based on the Government's cost of borrowing. An adjustment to the contaminated sites liability of \$10.6 million as a result of the change in discount rate is reflected in AECL's accumulated deficit upon transition. In addition, \$1,109.5 million previously recorded in the March 31, 2016 financial statements as part of the decommissioning and waste management provision was reclassified to the contaminated sites liability.

### **d) Employee Future Benefits**

According to PSAS, the actuarial gains and losses should be amortized over the expected average remaining service life of the related employee group. AECL has decided to use the first-time adopter exemption to recognize all cumulative actuarial gains and losses as at the date of transition to PSAS directly in accumulated deficit and as such adjusted the balances as of April 1, 2015 and March 31, 2016.



Under PSAS, the discount rate for the non-funded benefits must be established by reference to AECL's cost of borrowing. As AECL does not borrow money, information on AECL's cost of borrowing is not readily available, and therefore, the average yield on Government of Canada long-term bonds is used as a proxy for the cost of borrowing. An actuarial valuation was undertaken as at April 1, 2015 and a \$2.8 million loss associated with the change in the borrowing rate recognized directly into accumulated surplus (deficit).

### **e) Deferred Capital Funding**

Based on AECL's previous basis of accounting, Parliamentary appropriations used for the purchase of capital and intangible assets were recorded as deferred capital funding and amortized on the same basis and over the same periods as the related asset. Under PSAS, Parliamentary appropriations used for the purchase of tangible capital assets are recognized as revenue when authorized since the appropriations are not considered to have stipulations which meet the definition of a liability. As a result, the amount previously reported as deferred capital funding at April 1, 2015 of \$372.2 million was reflected within AECL's opening accumulated deficit at April 1, 2015. Amortization of deferred capital funding for the fiscal year ended March 31, 2016, previously included in Parliamentary appropriations of \$45.8 million, is not recognized under PSAS. Parliamentary appropriations received by AECL during the fiscal year ended March 31, 2016 for future capital acquisitions in the amount of \$145.3 million were included in Parliamentary appropriations. The amount recorded as deferred capital funding at March 31, 2016 of \$471.7 million was reflected in AECL's accumulated deficit at March 31, 2016.

### **f) Statement of Cash Flows**

The presentation of AECL's Consolidated Cash Flow Statements was revised to be consistent with PSAS, and reflect the change during the year in cash and cash equivalents. Cash paid to suppliers and to the employees is presented separately. Therefore, the cash paid to suppliers during the year ended March 31, 2016, under IFRS, which amounted to \$513.1 million was presented separately as cash paid to suppliers and cash paid to employees.

The acquisition of tangible capital assets, previously reflected as an investing activity, was revised to be presented as a capital activity. The Consolidated Statements of Cash Flow has also been amended to be consistent with other presentation changes to the Consolidated Statements of Financial Position and the Consolidated Statements of Operations as stated above in *Deferred Capital Funding*, of this note.

### **g) Reclassification**

Current assets and liabilities are not presented under PSAS. Therefore, the current portion of the other non-financial assets previously presented with the accounts receivable and the current portion of employee future benefits previously presented with the accounts payable and accrued liabilities were reclassified to the appropriate basis.

## h) Summary of Financial Adjustments

(thousands of Canadian dollars)

	Notes	
<b>Accumulated deficit as at April 1, 2015, as previously reported per IFRS</b>		<b>\$ (9,785,854)</b>
Adjustment to Tangible capital assets	a)	(6,530)
Adjustment to Decommissioning and waste management provision	b)	3,486,985
Adjustment to Employee future benefits	d)	(2,840)
Adjustment to Deferred capital funding	e)	372,175
<b>Accumulated deficit as at April 1, 2015, as restated per PSAS</b>		<b><u>\$ (5,936,064)</u></b>
<b>Accumulated deficit as at March 31, 2016, as previously reported per IFRS</b>		<b>\$ (11,066,562)</b>
Adjustment to Tangible capital assets	a)	(3,842)
Adjustment to Decommissioning and waste management provision	b)	3,255,082
Adjustment to Contaminated sites liabilities	c)	10,569
Adjustment to Employee future benefits	d)	(4,217)
Adjustment to Deferred capital funding	e)	471,692
<b>Accumulated deficit as at March 31, 2016, as restated per PSAS</b>		<b><u>\$ (7,337,278)</u></b>
<b>Annual deficit as at March 31, 2016, as previously reported per IFRS</b>		<b>\$ (139,916)</b>
Adjustment to Parliamentary appropriations for capital funding		145,328
Adjustment to Parliamentary appropriations for amortization of deferred capital funding		(45,843)
Adjustment to Revaluation gain (loss) on decommissioning and waste management provision and other		(173,630)
Adjustment to Financial expenses		(45,129)
Adjustment to Operating expenses		(1,234)
<b>Annual deficit as at March 31, 2016, as restated per PSAS</b>		<b><u>\$ (260,424)</u></b>

## 5. Trade and Other Receivables

<i>(thousands of Canadian dollars)</i>	<b>December 31, 2016</b>	March 31, 2016
Trade receivables	\$ 11,149	\$ 16,094
Less: allowance for doubtful accounts	<b>(3,419)</b>	(3,419)
Net trade receivables	<b>\$ 7,730</b>	\$ 12,675
Other receivables:		
Unbilled revenue	<b>8,291</b>	10,407
Consumption taxes receivable	<b>14,474</b>	9,911
Appropriations receivable	-	19,400
Other receivables	<b>1,098</b>	2,159
	<b>\$ 31,593</b>	\$ 54,552

## 6. Accounts Payable and Accrued Liabilities

<i>(thousands of Canadian dollars)</i>	<b>December 31, 2016</b>	March 31, 2016
Trade payables	\$ 1,819	\$ 562
Other payables and accrued expenses	<b>19,542</b>	10,699
Accrued payroll liabilities	<b>2,019</b>	2,810
Amounts due to related parties	<b>35,106</b>	31,548
Amounts due to Shareholder	<b>384</b>	381
Provisions	<b>12,301</b>	15,851
Restructuring provision	<b>398</b>	1,075
	<b>\$ 71,569</b>	\$ 62,926

The carrying values of trade and other payables are considered to be a reasonable approximation of fair value due to their short-term nature.

The Amounts due to Shareholder represent Royalty revenues. The Amounts due to related parties represent cash proceeds from the sales of heavy water (Note 19 of the annual audited consolidated financial statements dated March 31, 2016).

Provision amounts are short-term in nature and are not discounted and include exposure to claims related to life extension projects as well as lawsuits and legal claims, disputes with suppliers and an onerous lease.

## **7. Employee Future Benefits**

### **a) Pension Plan**

Employees of AECL participate in the Public Service Pension Plan (PSPP). The PSPP is a contributory defined benefit plan established through legislation and sponsored by the Government of Canada. Contributions are required by both the employees and the employer to cover current service cost. The President of the Treasury Board of Canada sets the required employer contributions based on a multiple of the employees' required contribution. Total contributions of \$0.4 million (Q3 2015-16: \$0.5 million) were recognized as an expense in the quarter and for the year-to-date contributions of \$1.6 million (year-to-date 2015-16: \$15.8 million) were recognized as an expense. The changes in contributions between 2015-16 and 2016-17 are due to the implementation of the Government-owned, Contractor-operated model, whereby the ownership of AECL's then-subsiary, CNL, was transferred to CNEA. As at the date of this transfer, employees of CNL became employees of a private-sector organization. While existing CNL employees are entitled to a three year transitional period in the PSPP, the employer contributions are being made by CNL. AECL's contributions noted above are for its small workforce which is responsible for providing contractual oversight of the Government-owned, Contractor-operated model.

The Government of Canada holds a statutory obligation for the payment of benefits relating to the PSPP. Pension benefits generally accrue up to a maximum period of 35 years at an annual rate of two per cent of pensionable service, multiplied by the average of the best five consecutive years of earnings. The benefits are coordinated with Canada/Québec Pension Plan benefits and are indexed to inflation.

### **b) Employee Benefits**

AECL provides certain voluntary termination compensation (VTC) and other post-employment benefits as described in Note 4(n) of the annual audited consolidated financial statements dated March 31, 2016. The defined benefit obligation is funded as benefits are paid. Accordingly, there are no plan assets and the defined plan deficit is equal to the defined benefit obligation of \$26.4 million (March 31, 2016: \$27.9 million).

The VTC included in the reported Employee benefits liability is \$11.2 million (March 31, 2016: \$12.7 million) and is payable in instances of future voluntary resignations and retirements. An estimate of the amounts expected to be paid in 2016-17 is based on AECL's most recent actuarial valuation.

AECL's total expense for employee benefits was \$(0.4) million for this quarter (Q3 2015-16: \$0.8 million). On a year-to-date basis, the total expense for employee benefits was \$1.9 million (year-to-date 2015-16: \$3.1 million). The decrease in benefits in Q3 of 2016-17 was due to a credit received for an overpayment on prior period employment benefits.

## 8. Decommissioning and Waste Management Provision

<i>(thousands of Canadian dollars)</i>	December 31, 2016	March 31, 2016
<b>Carrying amount - Beginning of period</b>	<b>\$ 6,763,423</b>	<b>\$ 6,487,228</b>
Liabilities settled	<b>(193,254)</b>	<b>(208,143)</b>
Unwinding of discount	<b>196,790</b>	<b>251,672</b>
Revision in estimate and timing of expenditures	<b>(10,502)</b>	<b>223,536</b>
Waste, decommissioning and site restoration costs from ongoing operations	<b>7,691</b>	<b>9,130</b>
<b>Carrying amount - End of period</b>	<b>\$ 6,764,148</b>	<b>\$ 6,763,423</b>

As the discount rate has remained unchanged over the period, there is no change in the discount rate to report.

The undiscounted future expenditures, adjusted for inflation, for the plan projects comprising the liability are \$17,416.0 million (March 31, 2016 – \$17,613.6 million).

The provision as at December 31, 2016 and March 31, 2016 was discounted using a rate of 3.88%.

## 9. Contaminated Sites Liability

As part of the implementation of the Government-owned, Contractor-operated model, the responsibilities for the implementation of Canada's commitments with respect to the Port Hope Area Initiative, including all of the assets and liabilities, were transferred to AECL in 2015-16. This included an order in council (P.C. 2015-1027) that transferred administration of the real property associated with the Port Hope Area Initiative from the Minister of Natural Resources to AECL.

AECL recognizes and estimates a liability of \$1,057.4 million (Q3 2015-16: \$nil) for the Port Hope Area Initiative using a net present value technique. The nature of the liability is the cleanup and local, long-term, safe management of historic low-level radioactive waste in the municipalities of Port Hope and Clarington. The liability is discounted using net present value techniques at a rate of 2.20%. The estimated total undiscounted expenditures are \$1,179.4 million (March 31, 2016: \$1,249.8 million).

As part of the Government-owned, Contractor-operated model, responsibility for the Low-Level Radioactive Waste Management Office has also transferred from Natural Resources Canada to AECL and includes all activities to address and manage historic low-level waste at sites in Canada for which the Government has assumed responsibility (excluding the Port Hope Area Initiative). A liability has not been recognized as insufficient information is available regarding

the scope, required remediation activities and schedule to reasonably estimate the cost of the obligation.

<i>(thousands of Canadian dollars)</i>	<b>December 31, 2016</b>	March 31, 2016
<b>Carrying amount - Beginning of period</b>	<b>\$ 1,109,493</b>	<b>\$ -</b>
Liabilities settled	<b>(70,385)</b>	(31,310)
Unwinding of discount	<b>18,306</b>	13,295
Revision in estimate and timing of expenditures	-	16,894
Contributed liability	-	1,110,614
<b>Carrying amount - End of period</b>	<b>\$ 1,057,414</b>	<b>\$ 1,109,493</b>

## 10. Tangible Capital Assets

*(thousands of Canadian dollars)*

	Construction in progress	Land and land improvements	Buildings	Reactors, Machinery and Equipment	<b>Total</b>
<b>Cost at March 31, 2016</b>	<b>\$ 220,749</b>	<b>\$ 83,249</b>	<b>\$ 309,765</b>	<b>\$ 427,189</b>	<b>\$ 1,040,952</b>
Additions and transfers	106,616	3,492	4,679	20,307	135,094
Disposals and transfers	(28,477)	(374)	(280)	(5,555)	(34,686)
<b>Cost at December 31, 2016</b>	<b>298,888</b>	<b>86,367</b>	<b>314,164</b>	<b>441,941</b>	<b>1,141,360</b>
<b>Amortization at March 31, 2016</b>	<b>-</b>	<b>41,617</b>	<b>187,824</b>	<b>306,024</b>	<b>535,465</b>
Increase in amortization	-	2,447	4,660	13,157	20,264
Disposals	-	(374)	(280)	(5,329)	(5,983)
<b>Amortization at December 31, 2016</b>	<b>-</b>	<b>43,690</b>	<b>192,204</b>	<b>313,852</b>	<b>549,746</b>
<b>Net carrying amount at March 31, 2016</b>	<b>220,749</b>	<b>41,632</b>	<b>121,941</b>	<b>121,165</b>	<b>505,487</b>
<b>Net carrying amount at December 31, 2016</b>	<b>\$ 298,888</b>	<b>\$ 42,677</b>	<b>\$ 121,960</b>	<b>\$ 128,089</b>	<b>\$ 591,614</b>

## 11. Funding

### a) Parliamentary Appropriations

AECL segregates its Parliamentary appropriations, which include Statutory Funding, to ensure funds are spent in a manner consistent with the basis for which they were approved. Approved Main Estimates and Supplementary Estimates include amounts for the operations of the Nuclear Laboratories, including the safe operations of the Chalk River Laboratories, as well as decommissioning and waste management activities. Statutory Funding relates to amounts associated with obligations pursuant to the divestiture of the Commercial Operations business.

For the three and nine months ended December 31, 2016, Parliamentary appropriations were received and recognized as follows:

<i>(thousands of Canadian dollars)</i>	<b>Three Months Ended</b>		<b>Nine Months Ended</b>	
	<b>December 31,</b>		<b>December 31,</b>	
	<b>2016</b>	2015	<b>2016</b>	2015
<b>Parliamentary appropriations for operating and capital expenditures</b>				
Amount received during the period for operating and capital expenditures	\$ 191,407	\$ 176,084	\$ 689,703	\$ 471,664
Amount receivable at the end of the period	-	-	-	-
Amount deferred from the previous period	167,980	115,380	-	-
Amount deferred to the next period	(191,407)	(156,684)	(191,407)	(156,684)
	<b>167,980</b>	134,780	<b>498,296</b>	314,980
<b>Statutory funding</b>				
Amount received during the period	-	-	-	-
Amount receivable at the end of the period	-	-	-	-
	-	-	-	-
<b>Total Parliamentary appropriations recognized</b>	<b>\$ 167,980</b>	\$ 134,780	<b>\$ 498,296</b>	\$ 314,980

Following the implementation of the Government-owned, Contractor-operated model, AECL receives Parliamentary appropriations directly for delivering on its decommissioning and waste management mandate. In 2015-16, this funding was provided to AECL by Natural Resources Canada, and as such, was recognized by AECL as 'Other funding'.

In Q3 2016-17, AECL received \$191 million and recognized a sum of \$168 million (Q3 2015-16: \$176 million received and \$135 million recognized). On a year-to-date basis, AECL received \$690 million and recognized \$498 million in Parliamentary appropriations (year-to-date 2015-16: \$472 million received and \$315 million recognized). The difference between received and recognized Parliamentary appropriations relate to amounts recorded as deferred funding.

The amounts approved for operating and capital expenditures for the years ending March 31, 2017 and 2016 totaled \$969 million and \$839 million, respectively.

Statutory funding approved for the years ending March 31, 2017 and 2016 totaled \$nil and \$17 million, respectively.

## b) Other Funding

Other funding was recognized as follows:

<i>(thousands of Canadian dollars)</i>	Three Months Ended		Nine Months Ended	
	December 31,		December 31,	
	2016	2015	2016	2015
Cost recoveries from third parties and other	\$ -	\$ 49	\$ -	\$ 9,801
Decommissioning and waste management	-	-	-	89,936
	\$ -	\$ 49	\$ -	\$ 99,737

As of September 13, 2015, AECL took over responsibility for fulfilling the Government's obligations with respect to legacy obligations associated with AECL sites as well as historic low-level radioactive wastes. Prior to this date, AECL received funding from Natural Resources Canada to undertake work with respect to legacy waste and historic low-level waste, which was recognized as 'Other Funding'. After September 13, 2015, funding for those activities was provided directly to AECL through Parliamentary appropriations.

## 12. Contractual Arrangement

As of September 13, 2015, AECL has been delivering its mandate through a long-term contract with CNEA for the management and operation of CNL under a Government-owned, Contractor-operated model. Prior to this date, CNL operated as a wholly-owned subsidiary of AECL.

Under the Government-owned, Contractor-operated model, the assets, sites and facilities continue to be owned by AECL, but are being managed and operated by a private-sector company. As such, AECL makes payments to CNL and CNEA ("Contractual amounts paid or payable") as per the terms of the contractual arrangement.

The following contractual expenditures were incurred:

<i>(thousands of Canadian dollars)</i>	Three Months Ended		Nine Months Ended	
	December 31,		December 31,	
	2016	2015	2016	2015
<b>Contractual amounts paid or payable</b>	\$ 206,536	\$ 195,221	\$ 656,414	\$ 220,754
Less: Costs charged to Decommissioning and waste management provision (see Notes 8, 9)	(80,160)	(48,646)	(261,841)	(56,082)
Less: Costs charged to Construction in progress	(37,099)	(41,565)	(106,761)	(46,146)
Less: Costs classified as Cost of sales	(9,893)	(19,351)	(46,266)	(22,730)
<b>Contractual expenses</b>	\$ 79,384	\$ 85,659	\$ 241,546	\$ 95,796

Contractual amounts paid or payable include all allowable expenses of CNL as well as fees paid to CNEA, in accordance with the long-term contractual arrangement between AECL and CNEA and CNL.



The balance due to CNL at December 31, 2016 was \$121.5 million and represents funding owing for allowable costs incurred by CNL.

## **13. Comparative Figures**

Certain of the December 31, 2015 comparative figures have been reclassified to conform to the financial statement presentation adopted in the 2016-17 fiscal year.



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