



March 26 ,2021

Chief Wilbert Marshall, Chair

The regular meeting of the AFNWA Board will be held Wednesday 31 March 2021 at 9:30 AM via the ZOOM virtual platform: <https://zoom.us/j/95306021265>

### **In Camera Reports**

1C Approval of Minutes of the In-Camera Meeting held on 13 January 2021.

2C Business Arising from Minutes

3C Accounting, Auditing & Consulting Services Contract Award

**Motion:** That the AFNWA Board approve the recommendation as outlined in the confidential report dated 25 March 2021

4C Appointment of Legal Counsel

**Motion:** That the AFNWA Board approve the recommendation as outlined in the confidential report dated 22March 2021

5C 2021/22 Chief Executive Officer Goals and Objectives

**Motion:** That the AFNWA Board approve the recommendation as outlined in the confidential report dated 26March 2021

6C Appointment of Elders Advisory Committee

**Motion:** That the AFNWA Board approve the recommendation as outlined in the confidential report dated 23 March 2021

7C 2021-2022 Agreement of Service – APC & AFNWA (TO FOLLOW)

**Motion:** That the AFNWA Board approve the recommendation as outlined in the confidential report dated 29 March 2021

### **Regular Reports**

1. a) Ratification of In-Camera Motions  
b) Approval of the Order of Business and Approval of Additions and Deletions

2. Approval of Minutes of the Regular Meeting held on 13 January 2021.

3. Business Arising from Minutes

- a) Transition Implementation Plan Update (22 March 2021)

4. *Revised* 2021-2022 AFNWA Operations Budget

**Motion:** That the AFNWA Board approve the 2021-2022 AFNWA Operations Budget in the substantive form attached

5. **Revised AFNWA Business Case**

**Motion:** That the AFNWA Board approve the revised AFNWA Business Case in the substantive form attached

6. **AFNWA Communications and Outreach Plan**

**Motion:** That the AFNWA Board approve the Communications and Outreach Plan in the substantive form attached

**Information Reports**

1-I Transition Implementation Plan Update (22 March 2021)

Original signed by

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James MacKinnon  
Board Secretary



**Atlantic First Nations Water Authority  
MINUTES**

**13 January 2021**

**PRESENT:**

Chief Wilbert Marshall, Chair  
Chief Arren Sock, Director  
Chief Andrea Paul, Director  
Chief Terry Paul, Director  
Chief Darlene Bernard, Director

**REGRETS:**

Chief Ross Perley, Vice Chair

**STAFF:**

Carl Yates, interim CEO, AFNWA  
James MacKinnon, interim COO, AFNWA  
Adam Gould, Manager of Communications & Outreach

**REGRETS:**

John Lam, Manager of Engineering

**TABLE OF CONTENTS**

CALL TO ORDER .....	3
1.a) RATIFICATION OF IN-CAMERA MOTIONS .....	3
1.b) APPROVAL OF THE ORDER OF BUSINESS AND APPROVAL OF ADDITIONS AND DELETIONS .....	3
2. APPROVAL OF MINUTES 02 December 2020 .....	3
3. BUSINESS ARISING FROM MINUTES .....	3
a) Transition Implementation Plan Update .....	4
b) Schedule Change for Board Meetings	
4. DATE OF NEXT MEETING .....	4

**CALL TO ORDER**

The Chair, called the regular meeting to order at 9:45AM via the Zoom virtual platform. The Board moved In Camera at 9:48 AM and the regular meeting reconvened at 10:15 AM

**1.a) RATIFICATION OF IN-CAMERA MOTIONS**

**MOVED BY Chief Terry Paul, seconded by Chief Andrea Paul, that the AFNWA Board ratify the In- Camera motions from 13 January 2021 meeting.**

**MOTION PUT AND PASSED.**

**1.b) APPROVAL OF THE ORDER OF BUSINESS AND APPROVAL OF ADDITIONS AND DELETIONS**

**MOVED BY Chief Terry Paul, seconded by Chief Arren Sock that the AFNWA Board approve the order of business as circulated.**

**MOTION PUT AND PASSED**

**2. APPROVAL OF MINUTES – 02 December 2020**

**MOVED BY Chief Terry Paul seconded by Chief Arren Sock, that the AFNWA Board approve the minutes of the regular meeting of 02 December 2020.**

**MOTION PUT AND PASSED.**

**3. BUSINESS ARISING FROM MINUTES**

Carl Yates advised that AFNWA has recently gone through the exercise of projecting our carry-over funds from Fiscal Year 2020-2021 and we are at ~ \$1.4M in carry -over and ISC has advised they have earmarked \$3M for AFNWA for fiscal year 2021-2022. We hope to get a more formal response from ISC in this regard soon.

a) Transition Implementation Plan Update (verbal)

James MacKinnon, interim COO, presented on the 08 January 2021 Transition Implementation Plan Update Board Report.

James noted that we held a virtual Operators workshop on 16 December 2020 as it was not on the TIP update; the workshop was well attended, and operators were very engaged.

There were no questions or comments on the TIP Update at this time.

b) Schedule Change for Board Meetings

The Board Executive met on November 19, 2020 and from that it was recommended to have a Board meeting every two months and the Board committees could meet in the in-between months. We will extend the Board meetings to 2 hours. The next Board meeting would be March 31<sup>st</sup>, 2031 (last Wednesday of the month) starting at 9:30AM.

Carl Yates advised that hopefully by July we may be able to meet in person.

**4. DATE OF NEXT MEETING**

The next meeting is scheduled for 31 March 2021 @ 9:30 AM

The meeting was adjourned at 10:45 AM

Original signed by

\_\_\_\_\_  
*James MacKinnon*  
*Board Secretary*

Original signed by

\_\_\_\_\_  
*Chief Wilbert Marshall*  
*Chair*

The following Information Items were submitted:

- 1-I Transition Implementation Update (08 January 2021)
- 2-I Schedule Change for Board Meetings



**TO:** Chief Wilbert Marshall, Chair, and Members of the Atlantic First Nations Water Authority Board

**SUBMITTED BY:** original signed by  
James MacKinnon, MPA, B.Sc., Interim Chief Operating Officer

**APPROVED:** original signed by  
Carl Yates, M.A.Sc., P.Eng., Interim Chief Executive Officer

**DATE:** March 22, 2021

**SUBJECT:** **Transition Implementation Plan - Update**

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## Information Report

### **ORIGIN**

Transition Implementation Plan [TIP] approved by the Board at the June 24<sup>th</sup>, 2020 meeting,

### **BACKGROUND**

The Transition Implementation Plan [TIP] provides a detailed overview of the AFNWA's internal developments as an organization, and external developments on projects and community outreach. The TIP will guide the overall operationalization of the AFNWA through staged phases and lead to full autonomous operations in Spring 2022. It describes the objectives of the phases and the process by which the steps and composite tasks are to be managed.

### **DISCUSSION**

The complete Transition Implementation Plan is attached for your reference, however some key highlights of development since our previous meeting are as follows:

- *Step 1: Operational Funding.*
  - *Funding has been received. Step 1 can now be considered complete.*

- **Step 2: Planning and Establishment of Governance.**
  - Accelerator Inc, in partnership with Tuma Young, has developed a Terms of Reference for the Elder's Advisory Committee. The request has gone to AFNWA member Chiefs for nominations to this committee.
  - An RFP was issued to solicited proposals for audit, accounting, and consulting services. The RFP closed on March 5<sup>th</sup>, 2021. Proposals were reviewed March 16, 2021 by Carl Yates (CEO), James MacKinnon (COO) and Janice Pyke (APC Financial Consultant). A preferred proponent was selected pending board approval.
  - A draft comprehensive communications strategy has been developed, by AFNWA's Manager of Communications, supported by National Public Relations.
  - Progress had been made on the AFNWA Website, with a landing page established. Full website launch is expected in May 2021.
- **Step 3a; Band Council Resolutions:**
  - ISC mentioned that BCR's in the final quarter of 2020-2021 are no longer necessary. The AFNWA has used this time to focus on communities that have not yet signed a BCR signaling intent to be members of the AFNWA. Efforts have been made to include nonmember communities as part of our SCADA Master Plan and Asset Management Plan work.
- **Step 3b: Implement Human Resource Strategy**
  - An offer of employment was extended to candidates for the positions of Manager of Corporate Services and Manager of Operations [resumes attached] and both have accepted the offers.
    - James Trimble, Manager of Operations (April 12)
    - Chantal LeBlanc, Manager of Corporate Services (March 29).
  - AFNWA has hired an Asset Management Technologist, Mohamed Osman. Mohamed started with the AFNWA on Jan 26, 2021.
  - AFNWA has hired an Administrative Assistant, Heather Patriarche. Heather started with the AFNWA on Feb 8, 2021.
- **Step 4: License Agreements**
  - AFNWA has engaged with McInnes Cooper and ISC to identify what is required for license agreements (land access) for each community.
- **Step 5: Implement Operations Model.**
  - The AFNWA has completed a revision of its business case, incorporating Ontario Clean Water Agency Feedback and

information from ISC on capital project spending in 2018-2020.  
The revised Business Case has since been submitted to ISC.

- *Step 7: Regulatory Oversight.*
  - AFNWA CEO and Rod Burgar met with Nova Scotia Utility and Review Board to discuss options for economic regulation of the AFNWA.
  - AFNWA senior management team met with the First Nations Financial Management Board (FNFMB) regarding their potential role in the economic regulation of the AFNWA. The conversations were well received. Working with the FNFMB, and other institutions enabled under the First Nations Fiscal Management Act will be explored further with a future report to the AFNWA Board.
  - Dalhousie continues its work on Water Safety Plans and Water Sanitation Plans. Site visits regarding this work will be carried out in the summer.
  - Dalhousie has been asked to provide a proposal for scope, schedule, and costs to update the previous regulations document completed in 2012. This could form the basis of a regulatory framework in combination with Water Safety Plans.
- *Step 8: Operational Planning:*
  - The CEO and COO continue to meet with Chiefs, Councilors, community administrators and operators to discuss the AFNWA and hear their concerns.
  - AFNWA has signed the lease for office space in the Millbrook Power Centre. The lease start date is April 1, 2021. Leasehold improvements are already underway.
  - AFNWA Manager of Engineering and consultants have one remaining community [Sipekne'katik] to visit for the SCADA master plan.
- *Step 9: Capital Planning*
  - A contract has been signed with Dillon Consulting Inc to complete the AFNWA Asset Management Plan and 10-year Capital Plan.
  - Environmental Risk Assessment wastewater samples are planned to be taken the week of March 22-26.
  - Requests have been made of each member Chief to sign a letter addressed to ISC requesting any and all information the Government of Canada holds regarding community water and wastewater infrastructure.
- *Step 13: Transfer Agreement*
  - Five working groups have been established to facilitate the work required to draft the Transfer Agreement with Government of Canada. They are:
    - Main Negotiating Table

- Transfer Agreement Drafting Working Group
- Asset Management Plan Working Group
- Lands Working Group
- Regulatory Framework Working Group
- AFNWA has assigned an internal lead for each working group who is responsible to report to the Main Negotiating table.

### **BUDGET and FINANCIAL IMPLICATIONS**

Activities associated with the TIP are funded through Funding Agreements secured with Indigenous Services Canada.

### **ATTACHMENT**

Transition Implementation Plan [Colour coded to denote progress]

Resumes for Chantal LeBlanc and James Trimble

Report Prepared by: original signed by  
James MacKinnon, interim COO, (902)-435-8021

Financial Reviewed by: original signed by  
Carl Yates, interim CEO, (902)-435-8021





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## Atlantic First Nations Water Authority Transition Period Implementation Plan

### Background

The AFNWA Business Case recommends a phased milestone-based approach with a two-year transitional period that allows detailed operational and capital budgets to be developed and agreed with ISC based upon an AFNWA operations plan; an Asset Management Plan (AMP); and a 10-year capital program.

The AFNWA has developed a Transition Plan which has been the principle vehicle for agreeing to a Framework Agreement between AFNWA and ISC. This plan which is organized into three key phases includes several steps that need to be delivered sequentially. These phases can be summarized as follows

- **Phase 1: Approval & Funding:** is an enabling phase which includes tasks which must be completed to allow the AFNWA to take on additional operational responsibility in 2020.
- **Phase 2: Operational Initiation:** comprises establishing the AFNWA management team in a staged manner to prepare for the ownership and operation of the participating First Nations water and wastewater assets
- **Phase 3: AFNWA Formation:** comprises the formalization of the AFNWA budget planning and consolidates these into a Funding Model. The funding requirements will be subject to negotiation with ISC with the understanding that the level of funding will be in line with the order of cost identified in the AFNWA business case.

AFNWA and ISC are close to completing a funding agreement which will provide the funds needed to deliver the Transition plan and progress over the next two years.

### Transition Period Implementation Plan

The Transition Period Implementation Plan (Implementation Plan) will guide the overall operationalization of the AFNWA and its phases will lead to fully autonomous operations in Spring 2022. It will describe the objectives of the phases and the process by which the steps and composite tasks are to be managed.



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

The delivery of the Implementation Plan will necessitate a team with diverse knowledge, expertise, and experience. The Implementation Plan contains the information needed to deliver the transition successfully, in terms of integration, communication, quality, cost, schedule, risk, scope, and overall project management. The Implementation Plan defines the governance and organizational structure; the management, administrative, and reporting processes that will be used; and the decision-making responsibilities and authorities for each principal stakeholder.

While Implementation Planning has commenced, finalizing and delivery of the Plan will require the input from the Senior Management Team which has yet to be recruited. The immediate intention of the Plan is to identify the relevant tasks that need to be completed but not to provide the complete details on how they will be delivered. While it is recognized that the CEO will have ultimate accountability for delivery of the Implementation Plan, potential resources required to develop tasks (whether internal or external resources), and reviewer / approver information has been added for considerations.

As each task is formally initiated, it is recommended that the AFNWA initiate further project definitions (i.e. project charter, timing, resources) to guide task implementation. Within the Transition Plan, tasks anticipated to require a formal project charter or workplan are marked with an asterisk (\*). As individual tasks are initiated, additional task implementation planning is anticipated, and this will be reviewed by the CEO and Senior Management Team on a regular basis.



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

Phase 1: Approval and Funding.					
<p><b>Step 1a: Operational Funding</b> Funding Commitment by Government of Canada to provide long term funding to AFNWA in line with the order of cost identified in the Business Case.</p> <p>Noting that long term funding will come with final negotiation at the end of this two-year transition. Execution of the Transitional Funding Agreement and signature of the Framework Agreement will signify commitment to this objective.</p>					
Tasks	AFNWA Owner	Resources <sup>1</sup>	Reviewer /Approver	Recommended Completion Date	
1.0	Framework agreement signed demonstrating a co-development process and commitment for long-term AFNWA funding (key milestone)	COO	CY, RB, Colliers	ISC	May 15, 2020
2.0	Complete Transitional Funding Agreement between AFNWA and ISC to cover two-year Transition Period	COO	CY, RB, Colliers	ISC	May 1, 2020
3.0	Cash flow draw system (incl. bank number), schedule (refer to ISC conference call minutes)	COO	RM	ISC	May 15, 2020
4.0	Develop Transition Plan Template	COO	Colliers	CEO	May 15, 2020

<sup>1</sup> A full description of resource abbreviations has been provided following the phase 3 tasks.



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

Phase 1: Approval and Funding.					
<b>Step 2: Planning and establish governance</b>					
Funding Commitment by Government of Canada to provide long term funding to AFNWA in line with the order of cost identified in the Business Case.					
Noting that long term funding will come with final negotiation at the end of this two-year transition. Execution of the Funding Agreement and signature of the Framework agreement will close step 1					
Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date	
1.0	Establish organization				
1.1	CEO	COO, McInnis Cooper	Board	August 1	
1.2	CEO	COO, SMT	CEO	Ongoing	
1.3	COO	RM	CEO	Dec. 31, 2020	
2*	Identify corporate policies and procedures needed				As req'd on a priority basis
2.1	Mgr. Comms	COO, RM	Board		
2.2	CEO	COO, McInnis Cooper, Mgr. CS, Colliers	Board		
2.3	CEO	Mgr. CS, COO	Board		
2.4	CEO	Mgr. CS, COO	Board		



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

2.5	Information Technology	Mgr. CS	COO, JH	CEO	
2.6	Training and Development policy (Parts found within the APC HR Policy)	Mgr. CS	COO, Supervisor CS, RM	CEO	
2.7	Discipline policy (incl. Two Eyed Seeing)	COO	McInnes Cooper, Elders Council, JP, RB	CEO	
2.8	Pension and Benefits policy	CEO/Mgr. CS	McInnes Cooper, Supervisor CS	Board	
2.9	Health and Safety policy	CEO	Mgr. CS, COO, Supervisor CS, JH	Board	
2.10	Environmental policy	CEO	SMT, GG	Board	
2.11	Security policy	CEO	SMT	Board	
2.12	Code of Conduct	CEO	McInnes Cooper, Mgr. CS, COO, RM	Board	
2.13	Debt policy (elements found within the Financial Policy)	Mgr. CS	COO, CEO, Colliers	Board	
2.14	Spending Authority (Financial Policy, will need to be altered)	CEO	Mgr. CS, COO, Colliers	Board	
2.15	Fraud (Elements found within the APC Financial Policy)	Mgr. CS	COO, CEO, Colliers	Board	
2.16	Document Management policy, recommended solution, and tool considerations (utilize APC in interim)	COO	SMT, Colliers JH, RM	CEO	
2.17	Violence and Harassment policy	CEO	McInnes Cooper, Mgr. CS, COO	Board	
2.18	Hiring policy	COO	JH	CEO	
2.19	Conflict of Interest Policy	CEO	COO, Mgr. CS, Colliers	Board	
2.20	Develop AFNWA specific templates - minutes, action list, SOPs	COO	RM, JH, Colliers	CEO	
3.0	Establish financial and accounting policies and frameworks				



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

3.1	Identify Gaps in APC Financial Policies - debt policies, accounting structures being used, align with Treasury Board policies / rates,	Mgr. CS	COO, Colliers	CEO	
3.2	Set up basic accounting framework, general ledger, yearly audit standards & audit timelines, income statements, balance sheets – (service may start with APC but transition to AFNWA) - services could be provided on an interim basis by APC; - there are # of other corporate services APC can provide; gradual transition to AFNWA	Mgr. CS	COO, 3 <sup>rd</sup> party advisor, Colliers	CEO	Establish for first fiscal year [2020/2021]
3.3	Tax exemption letters from CRA - anticipated to be received once a lease is signed	COO	Mgr. CS,	CEO	June 1, 2020
3.4	Audited statements 2021 (milestone)	Mgr. CS	COO, CEO, Colliers	Board	July 31, 2021
4.0*	Board governance				
4.1	Establish Board Governance Framework - solicit consultant proposal - develop work plan	CEO	COO, RB, Colliers	Board	
4.2	AFNWA Implementation Plan - Board delegated resp. to CEO to manage - CEO owns plan; recommendations to the Board, as req'd - COO & Board Executive work with CEO - Board approves key items	CEO	COO, RB, Colliers	CEO	March 31, 2022
4.3	AFNWA Board Terms of Reference - CEO works with Board executive, legal advice - Incl. governance (i.e. operating water authority, approvals & authorities), roles (i.e. day to day)	CEO	COO, JP, RB	Board	Initiates with hiring of CEO, completes Nov 2020
4.4	Board governance Workshop (Face to Face) - Define roles and resp, Specific Board terms, committee, compensation	COO	RB, Colliers	CEO	Sept/Oct. 2020



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

4.5	AFNWA Board and Committees Terms of Reference [e.g. Executive, Audit and Finance, Environment, Health and Safety]	CEO	COO, RB, Colliers	Board	Draft Nov. 30/20
4.6	AFNWA Board Formally Approves Term of Reference (milestone)	CEO	COO, RB	Board	Feb.1, 2021
4.7	Board Compensation Policy	CEO	COO, RB	Board	April 1, 2021
4.8	Selection of Elders Council, develop Terms of Reference - Process for Board to engage with Elders Council - Lead/ Head Elder? Ex-officio to Board? Serve as Director on Board?	CEO	COO, RB	Board	March 1, 2021
5.0*	Establish document management system	COO	JH, Colliers, RM	CEO	Dec. 31, 2020
6.0	Develop communications strategy	Mgr. Comms	COO, Comms Consultant	CEO	Feb 1, 2021
7.0	Define ISC approvals process				
7.1	Develop engagement plan with ISC - Strategy and framework of approach - Meeting schedule and intent - Identify and clarify requirements	COO	RB, McInnis Cooper,	CEO	February 1, 2021
7.2	Identify milestones and approvals (required by Federal government) - Schedule, process, Cabinet date, timeline, milestones, minutes & action list	COO	RB, Colliers, Central Agency reps,	CEO	As Req'd
7.3	Identify Board approvals and reporting required - Tied to ISC negotiations	COO	RM, Colliers	CEO	As Req'd



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

Phase 1: Approval and Funding.					
Step 3a: Band Council Resolutions					
<p>The commitment to GOC funding will allow Band Council Resolutions (BCR) to be completed with participating First Nations Bands. This deliverable will require the AFNWA interim COO to travel to participating and non-participating First Nations alike to request a BCR for further continuation of the project. This will allow license and asset transfer agreements to be developed. This step is dependent on the signature of the proposed framework agreement before the community visits commence.</p>					
Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date	
1.0					
1.1					
1.1	COO	McInnes Cooper, ISC	CEO, Board, Band Council	Jun 30, 2020	
1.2	COO	RB, Colliers	CEO		
1.3	CEO	COO	Board		
1.4	Mgr. Eng.	COO, JH	CEO		
1.5	COO		CEO	Jun 30, 2020	
1.6	COO	RB,	CEO	Fall 2020 or Winter 2021 depending on Pandemic Restrictions	



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

2.0	BCR approval by communities				
2.1	Organize Community visits - present to Councilors, gain input, make changes / tweaks. This round of BCRs will signify a further commitment to the AFNWA. AFNWA COO and CEO will travel to each community to present to Chief and Council to seek their continued support [22 communities].	COO	RB, RM	CEO	Fall 2020 / Winter 2021
2.2	Request signature - by community based on meeting with Councils - Presentations to communities	COO	CEO (as req'd), Mgr. Comms	CEO, Band Council	As Req'd
2.3	Renew BCR commitments for existing Communities (15 + 7 communities).	COO		CEO	January 31, 2021
3.0	Outreach to other communities to extend invitation to join AFNWA (note: dependent on Framework Agreement)	CEO	COO	CEO	Ongoing up to Dec 1, 2021
4.0	Develop draft BCR process & commitments for communities to join AFNWA after Transfer Agreement - Process to be defined - Resources to be identified in negotiations with GoC	COO	McInnes Cooper, RB	CEO	Winter 2021/2022



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

### Phase 1: Approval and Funding.

#### Step 3b: Implement Human Resources Strategy

The recruitment of a CEO and senior management team is key to delivering phase 2. Obtaining GOC commitment to funding will allow the following activity to commence.

- Contract with a professional search organization
- Hire the CEO and senior managers

These manager positions will have to be selected in order of priority. For 2020-2021, however, it is recommended that the CEO and Manager of Engineering be identified to work alongside the interim COO. At the start of 2021-2022, the remainder of the senior management team will be hired.

Note – Current COO continues to play a strong liaison role with First Nation Chiefs, Board, ISC, and communities; supports CEO as the utility transitions to full operations in 2022.

Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date
1.0 Human Resource planning				
1.1 Develop Human Resource strategies that recognize the experience and knowledge of staff currently employed in water and wastewater system operation and take a consistent approach to salaries, benefits, training, and career development. Confirm skills to operate business	Mgr. CS	COO, Supervisor CS, JH	CEO	Sept 1, 2021
1.2 Research pay and compensation (internal and external equity) - Seek outside HR consultant support	CEO	Mgr. CS, COO	CEO	Summer / Fall 2020
1.3 Develop and complete draft CEO job description	CEO	COO	Board	May 15, 2020
1.4 Develop and complete SMT job descriptions	COO	JH, RM	CEO	As Req'd
1.5 Develop and complete staff job descriptions	Mgr. CS	SMT, Supervisor CS	CEO	As Req'd



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

2.0	Formal staff recruiting				
2.1	Complete RFP for professional recruiting firm	COO	CEO, RM	CEO	April 28/20
2.2	Hire a professional recruiting firm to recruit qualified personnel as candidates for Senior Management positions.	COO	CEO, RM	CEO	May 22/20
3.0	Recruit key staff				
3.1	Recruit (Interim) CEO for 2-year transition	Board	COO	Board	July 2020
3.2	Recruit Manager Engineering (permanent)	CEO	COO, Recruitment Consultant		September 1, 2020
3.3	Recruit Manager Communications & Outreach (permanent)	CEO	COO, Recruitment Consultant		Dec. 1, 2020
3.4	Recruit Manager of Corporate Services (permanent)	CEO	COO, Recruitment Consultant	CEO	January 1, 2021
3.5	Recruit Manager Operations (permanent)	CEO	COO, Recruitment Consultant	CEO	April 1, 2021
3.6	Hire asset management technologist	Mgr. Eng.	COO, JH	CEO	Sept. 1, 2020
3.7	Hire admin assistant	COO	Mgr. Eng., RM	CEO	Oct. 1, 2020
3.8	Recruit or hire superintendents	Mgr. Op	Mgr. CS, JH	CEO	June 1, 2021
3.9	Recruit permanent CEO	Board	Interim CEO, COO	Board	April 30, 2022



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

Phase 1: Approval and Funding.					
Step 4: License Agreements					
Finalizing BCRs will enable licensing/land access agreements to be drafted and completed with participating First Nations Bands. The AFNWA and its legal team will work directly with First Nations lands departments, ISC, the Department of Justice to create land access/license agreements that will both allow the AFNWA to enter communities, exclusively work on water and wastewater infrastructure, and indemnify Chiefs and Councils for water quality.					
Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date	
1.0					
1.1					
1.1	COO	ISC, Dept Justice, community representatives McInnes Cooper		May 31, 2020	
1.2	COO	Band representatives ISC, Operator Working Group McInnes Cooper	Band Council/ Board		
1.3	COO	Band representative ISC, Operator Working Group McInnes Cooper	Band Council/CEO Board /	October 31, 2020	
2.0					
2.1					



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

	<ul style="list-style-type: none"> <li>two options to be considered</li> </ul>				
2.2a	Option 1- Existing community mapping, or minimum required being the list of assets that are required	Mgr. Eng.	COO, Band land manager, ISC, McInnes Cooper	CEO	December 1, 2020
2.2b	Option 2 - Mapping in connection with Asset Management Plan, Identify or confirm assets, surveyors land in question, geomatic scanning (or is this part of the AMP)	Mgr. Eng.	COO, Band land manager, ISC, McInnes Cooper	CEO	December 1, 2020
3.0	License agreements				
3.1	<p>License agreements engagements</p> <ul style="list-style-type: none"> <li>interested community representatives</li> <li>identify elements that will used for AFNWA commitment through BCR</li> </ul>	COO	McInnes Cooper, RB		Fall 2020
3.2	<p>Draft license agreements</p> <ul style="list-style-type: none"> <li>Generally common, accompanied with a map</li> </ul> <p>Specifics based on band (i.e. municipal transfer agreement)</p>	COO	McInnes Cooper, RB	Band Council/CEO Board /	January 1, 2021
3.3	<p>Group engagements follow up, land workshops</p> <ul style="list-style-type: none"> <li>Land reps from interested communities</li> <li>Presenting final draft</li> </ul>	COO	ISC, McInnis Cooper, RB, Band Council, Community	CEO	
3.4	Recommend license agreement for final approval to the Board (combine with below)	CEO	COO, RB, McInnis Cooper, Band Council	Board	April 1, 2021
3.5	<p>Signature of license agreements</p> <ul style="list-style-type: none"> <li>Confirm whether condition of final funding</li> </ul>	CEO	COO, RB, McInnes Cooper, Band Council	Band Council/ Board	July 1, 2021



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

### Phase 2: Operational Initiation.

#### Step 5: Implement an FSD “Hub and Spoke” operations model.

Hire all senior staff by April 2021 (one year after funding approval) with a clear preference to hire from participating Atlantic First Nations. The tasks of these managers will be to develop and adopt a formal training and development program for all staff. Furthermore, senior managers will develop Human Resource strategies that recognize the experience and knowledge of staff currently employed in water and wastewater system operation and take a consistent approach to salaries, benefits, training, and career development.

The development and implementation of the hub and spoke model is conditional upon the input of the Senior management team. When the SMT is in place a detailed implementation plan for this step will be developed.

Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date
1.0 Ontario Clean Water Agency (OCWA) Peer Review Business Case	COO	CEO, OCWA, JH, Colliers	ISC	Fall 2020
2.0 ISC accepts the Business Case (milestone)	CEO	COO, Colliers, JH	Board / ISC	April 1, 2021
3.0 Develop plan to implement hub and spoke model <ul style="list-style-type: none"> <li>- i.e. supervisor allocation, technical supervisor set up, connections to HR strategies</li> <li>- consultation with future operators, Board, communities,</li> <li>- financials</li> </ul>	Mgr. Ops	SMT, JH,	CEO	Sept. 1, 2021
4.0 Regular updates to Board For information	CEO	SMT, COO	Board	Monthly



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

<b>Phase 2: Operational Initiation.</b>					
<b>Step 6: Implement Transition Management.</b>					
AFNWA appoint a dedicated transition management team. Develop an AFNWA transition management strategy and align the communications and transition management strategies to ensure effective engagement and support. This step will be maintained for the 2-year transition period.					
Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date	
1	AFNWA appoint a dedicated Transition Management Team (TMT) to navigate change with external consultant as support.	SMT	COO, RB, Colliers	CEO	Starting April 2021
2*	Develop and implement Transition Management Plan - Establish transition management milestones with AFNWA, communities, Government, operators, others	SMT	COO, RB, Colliers	CEO	From June 1, 2021 to end of 2023

<b>Phase 2: Operational Initiation.</b>					
<b>Step 7: Regulatory Oversight.</b>					
AFNWA confirm regulatory Oversight Agencies with GOC. and develop a plan for implementing their requirements. As an interim step, the AFNWA and Dalhousie University will continue their work in developing a strategy for operating in an unregulated environment.					
Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date	
1*	Regulatory oversight planning				



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

1.1	AFNWA and Dalhousie University will continue their work in developing water safety plans for operating in the interim within an unregulated environment. - NSERC application - Proposal consideration	CEO	COO, GG, ISC, Mgr. Eng., Mgr. Ops, JH	CEO	April 1, 2021
1.2	Develop (interim step) potential set of processes to facilitate auditing for compliance to benchmark standards (updated from original 2013 regulations prepared by Dalhousie)	Mgr. Ops	SMT, GG, JH,	CEO	Sept 30, 2021
1.3	Adoption of interim regulations	Mgr. Ops	SMT, GG, JH	Board	June 30, 2021
2.0	Determine long term regulations (influenced significantly by the work being conducted by the Assembly of First Nations)	CEO	SMT	Board	As Req'd
3.0	Work with Federal Government to determine Water Quality and Wastewater Effluent regulator (Environment Canada). Develop strategies to gain Public Servant support.	CEO	SMT, GG, ISC	Board	Sept. 1, 2021
4.0	Determine Federal financial regulator	CEO	SMT, ISC	Board	June 1, 2021
5.0	Review current composition / recruitment of additional board members				
5.1	Additional band representation	Board Executive	CEO, COO, RB	Board	As Req'd
5.2	Additional technical, SME experts - Financial, communications, legal, scientific etc.....	Board Executive	CEO, COO, JH, Colliers	Board	April 1, 2021
5.3	Appointment of a Vice Chair	COO	Board Chair	Board	May 15, 2020



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

Phase 2: Operational Initiation.					
Step 8: Operational planning.					
Senior Management team develop an operations plan that identifies AFNWA operational funding requirements including:					
<ul style="list-style-type: none"> <li>board and management costs,</li> <li>operating and maintenance costs</li> <li>administration and accommodation costs,</li> </ul>					
Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date	
1.0	AFNWA headquarters facility				
1.1	Develop Headquarters accommodation, space, and technical requirements (Search criteria)	COO	RM, Colliers	CEO	June 1/20
1.2	Search for headquarters accommodation on reserve. Enables temporary (medium term; 5-7 years) vs eventual construction (long term), incorporates Board direction	COO	RM, Colliers, Band Land Manager	CEO	August 1/20
1,3	Develop and Secure IT requirements, office equipment, furniture etc. Note: staged IT requirements may be required as full IT Policy will be finalized with the engaged of the Director Corporate Services.	COO	Mgr. Eng., RM, JH	CEO	Oct. 1/20
1.4	Lease & financial impact review	COO	COO, McInnes Cooper,	CEO	Sept. 1/20
1.5	Board lease approval	CEO	COO	Board	Sept.1/20
1.6	Move in to headquarters facility	COO	RM, Contractor	CEO	Oct.1/20
2.0	Develop Operations budget for 2021/22 fiscal year	Mgr. CS	SMT, COO	CEO	March 1/21
3.0	Develop Operational Plan for commencement of operations	Mgr. Ops	SMT, COO, Consultant	CEO	Jan 31/22



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

Phase 2: Operational Initiation.					
Step 9: Capital planning.					
The implementation of step 5 will allow Senior Management to develop an asset management plan within 18 months of AFNWA operations and a draft 10-year capital program based on the asset management plan. This further emphasizes the need to retain the AFNWA CEO and Manager of engineering within the first quarter of 2020-2021					
Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date	
1.0*	Identify what is required specifically for the Asset Management Plan (AMP) plan	Mgr. Eng.	COO, JH,	CEO	Sept 1, 2020
	<ul style="list-style-type: none"> <li>• Develop project charter including schedule, scope etc.</li> <li>• Project requirements</li> <li>• Required consultant requirements</li> </ul>				
2.0	Develop and issue RFP for consultant to support development of AMP and 10-year capital budget.	Mgr. Eng.	Consultant, JH,	CEO	Sept 30, 2020
3.0	Organize an Asset Management Workshop for operators and technical staff of the AFNWA.	Mgr. Eng.	Consultant, Mgr. Ops, JH,	CEO	March, 2021
4.0	Develop a comprehensive AMP for the infrastructure in participating communities.	Mgr. Eng.	Consultant, SMT, JH	CEO	Sept. 30, 2021
5.0	Develop a draft 10-year capital plan that is based on the asset management plan.	Mgr. Eng.	Consultant, SMT Colliers. JH	CEO	Dec 31, 2021



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

Phase 3: Detailed Business Case and Funding					
Step 10: Risk assessment.					
<p>Prepare a detailed risk assessment to act as an input into the detailed financial model. This will be an ongoing practice within the AFNWA. The asset management plan will identify detailed operational risks; however, it will be the prerogative of the AFNWA senior management to identify additional risks along with the appropriate mitigation strategy. Risks categories may include but are not limited to:</p> <ul style="list-style-type: none"> <li>• Economic</li> <li>• Social</li> <li>• Political</li> <li>• Technological</li> <li>• Legal</li> <li>• Environmental</li> </ul>					
Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date	
1.0	Develop and issue RFP to develop Enterprise Risk Management System - Proposal consideration / external consultant	Mgr. CS	CEO, SMT, COO, Colliers	CEO	Jun 1, 2021
2.0	Complete Enterprise Risk Management System for Approval of Board - Workshops with Board, SMT - Risk register - Timelines for review	CEO	SMT, Consultant, COO, JH, RM	Board	Nov 30, 2021



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

Phase 3: Detailed Business Case and Funding					
<b>Step 11: Financial Model.</b>					
Develop a detailed financial model that incorporated inputs from the AMP, Operational plan, risk assessment and 10-year capital spending plan to identify the operational and capital funding required to operate the AFNWA for the first 25 years of operation. The model should be sufficiently detailed to consider scenarios and risks which might impact operations and service delivery. The model will be a vehicle for agreeing the funding model with GOC.					
Complete Step 11 Mar 2021					
Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date	
1.0	Incorporate inputs from the AMP, Operational Plan, risk assessment and 10-year capital spending plan to identify the operational and capital funding required for the AFNWA.	Mgr. CS	SMT, Colliers	CEO	Mar 1, 2022
2.0	Finalize financial reporting				
2.1	Develop corporate financial reporting, models (operations and capital) - Management information required. - External reporting (i.e. GoC) requirements	Mgr. CS	COO, Colliers	CEO	March 30, 2022



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

<b>Phase 3: Detailed Business Case and Funding</b>					
<b>Step 12: Refine Detailed Budgets and funding model.</b>					
The intention of this step is to review the detailed financial model and risk assessment with ISC and Participating First Nations to develop/agree a detailed funding model.					
Complete Step 12 June 2021					
Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date	
1.0	Review the detailed financial model with ISC and Participating First Nations to develop/agree on a detailed funding model - Informed by multiple sources including the enterprise risk management system	Mgr. CS	SMT, Colliers	Board, ISC Band Councils	Mar 1, 2022
2.0	Develop Business Plans for AFNWA Board Approval	CEO	SMT, COO	Board	
2.2	Determine Business Plans draft Table of Contents	CEO	SMT, ISC	Board	June 1, 2021
2.3	Ten Year Business Plan	CEO	SMT, COO	Board	Jan. 31, 2022
2.4	One Year Business Plan	CEO	SMT, COO	Board	Feb.28, 2022



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

Phase 3: Detailed Business Plan and Funding					
Step 13 Transfer Agreement.					
Transfer Agreement will coincide with the date of AFNWA full autonomous operation. The Transfer agreement will include the agreed funding model and will address how changes such as future upgrades to regulations will be dealt with.					
Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date	
1.0 Determine method of funding - Order and Council; and / or - 10-year grants	CEO	SMT, ISC, COO	Board / ISC	Dec. 1, 2021	
2.0 Define Transfer Agreement financial/liability requirements - Constituent parts	CEO	SMT, COO, ISC, McInnes Cooper	Board / ISC	Dec. 1, 2021	
3.0 Final Detailed Funding Model Approval By Board	CEO	SMT, Colliers	Board	Mar 1, 2022	
4.0 The Transfer Agreement (GoC) will include the agreed funding model, regulatory oversight requirements and address how changes such as future upgrades to regulations will be dealt with - Define requirements - Will reference several documents (BCR's, License Agreement, Business Plans, regulators etc.)	CEO	SMT, ISC, COO, McInnes Cooper	Board / ISC	Spring 2022	



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

### Resource Legend

COO – James MacKinnon	Mgr. CS – Corporate Services	Mgr. Ops - Operations	CY – Carl Yates	Colliers – Representatives based on expertise	JH – Jamie Hannam
RM – Rayleen MacDonald	Mgr. Comms – Communications & Outreach	Mgr. Eng. - Engineering	RB – Rod Burger		GG – Graham Gagnon
JP – John Paul	SMT - describe	TMT – members of SMT as assigned			

## EDUCATION & CERTIFICATIONS

**Chartered Professional Accountant** | CPA Canada

**Master of Business Administration** | BROCK UNIVERSITY

**First Class Honours Bachelor of Business Administration** | BROCK UNIVERSITY

**Honours Diploma of Business Accounting** | MOHAWK COLLEGE

## PROFESSIONAL EXPERIENCE

### ENGMAN GROUP OF COMPANIES

2018 to Present

#### **Chief Financial Officer**

- Managed all day-to-day operations and strategic decisioning for a group of 7 companies encompassing a range of industries including service, retail, wholesale, manufacturing, real estate holdings and hospitality.
- Coordinated and prepared all financial reports for the purposes of; presentation to the CEO and all other internal and external stakeholders, audit response, and departmental reviews. Prepared all budgets and financial forecasts, managed cashflow, and negotiated procurement of raw materials, inventory and commercial leases.
- Redesigned interdepartmental operations to ensure adequate internal controls as they pertain to procurement, budget adherence, fraud and theft prevention and reporting consistency.
- Assisted HR manager in the redesign of existing organizational chart as well as the establishment and negotiation of employee contracts and interpreting severance policy, where applicable. Further participation in programs for employee wellness, retention efforts, team building activities, and implemented a fully amended incentive plan for external sales team in order to appropriate commissions and bonuses to build towards broader organizational goals.
- Assisted COO in Occupational Health and Safety Standards adherence, participating in Ministry reviews and coordination of a master binder with all relevant information.
- Participated in a variety of relevant formal and informal committees including; cultural awareness training (Indigenous), employee compensation and benefits, large event coordination, and external contract negotiation (waste management, wastewater charges, fixed asset sales, request for proposal response for multi-year service contracts, banking and insurance service relationships, shareholder disputes).

### ROYAL BANK OF CANADA

2016 to 2018

#### **Commercial Account Manager**

- Managed a portfolio of 110 unique commercial clients, encompassing a diverse range of industries within the Muskoka area including; investment properties, manufacturing, retail, business services, and wholesale/distribution.
- Worked with clients to identify how the Bank can best support sustainable growth with the goal of becoming a trusted advisor by providing valuable insight to decision makers and senior leadership teams.
- Completed routine Risk Analysis for each client while adhering to the Bank's compliance procedures in order to minimize the probability of losses in default scenarios.
- Worked independently in a satellite location maintaining a strong partnership with geographically diverse colleagues in retail banking, wealth management, equipment financing specialists, treasury management and derivative asset partners.

**Senior Manager, Aboriginal Financial Services**

- Managed a national portfolio of Commercial Indigenous clients, providing advice to regional directors and account managers regarding cultural awareness as well as structuring credit deals working within the limitations of securitization resulting from the land provisions of the Indian Act.
- Assisted the VP in managing the departmental budget, weighing the effectiveness of our corporate social responsibility budget and prioritizing events and causes that maximized impact and were mutually beneficial to the Bank and the Indigenous community.
- Participated in numerous conferences representing the Bank, listening to the challenges experienced in communities across Canada and relaying the information back to the Bank in an effort to update bank policies and work together with our clients to overcome these challenges.
- Attended a series of Ken Blanchard courses focused on leadership development covering topics included but not limited to; problem solving and decision making skills, critical thinking, conflict resolution, strategic networking and negotiating, effective communication, effective team leadership and strategic prioritization.

**Senior Manager, Commercial Banking**

- Carefully conducted financial and industrial risk analysis for prospective and existing customers, with consideration and adherence to the Bank's internal risk policies and procedures through a sufficient level of due diligence with a high level of attention to detail.
- Managed a 150 million dollar portfolio encompassing diverse industrial and geographical environments which demanded an intensive level of research in local and global markets in order to fully understand the specific needs of the client and develop programming to fit their existing and future requirements.
- Planned, researched and communicated comprehensive credit analysis reports, effectively conveying all pertinent information and making recommendations using sound, rationalized judgment allowing the adjudication team to confidently support the credit recommendation.
- Analyzed client-prepared forecasts to test for feasibility and/or using historical financial data and industrial trends to generate forecasts and conduct sensitivity analysis.

**COMMUNITY LEADERSHIP EXPERIENCE****Treasurer**

ESSA AGRICULTURAL SOCIETY

- Completed a one-year contract for the Treasurer position on the Board of Directors. During my term, I also helped the office staff to develop monthly reporting procedures as well as the preparation of year-end reporting for delivery to the auditor.

**Director, Social Engagement and Membership, Scotiabank Young Professionals**

SCOTIABANK

- Managed a membership base of over 100 members across 23 branches. Drafted and delivered all communication regarding upcoming events and current community initiatives using all digital mediums including leveraging Social Media to publicize event results thereby increasing the positive image of the Bank of Nova Scotia in the community.

**Not-For-Profit Housing – Volunteer**

JAYCEE NOT-FOR-PROFIT HOUSING

- Assisted the property manager to develop, implement and transition to a new filing system, digitizing all information regarding property improvements and rental arrears for easy future accessibility.

**COMPUTER AND SOFTWARE SKILLS**

- Advanced skills in MS Office - Word, Excel, PowerPoint, Outlook and Access
- Advanced skills in Accounting software – Quickbooks, Simply Accounting, AccPac
- Sales Management – Salesforce.com and other various internally designed sales management software
- ERP software – EKOS, SmartVendor, and other various software systems with automatic and manual communication to our primary ERP

**REFERENCES**

- Available upon request

# James E. Trimble RPA

875 Cedar Point Road  
Tiny, ON  
L9M 0K2  
Home (705) 812-0646  
Cell (705) 529-8097  
E-mail james.trimble2@gmail.com

## Highlights:

BOMI Real Property Administrator Designation.  
Community Emergency Management Coordinator (ON)  
2<sup>nd</sup> Year CGA Accounting Program.  
Familiar with a variety of computer software programs.  
Extensive knowledge in property management, project management, staff training and development, maintenance, marine infrastructure, and northern construction.  
Knowledge in working within and between all levels of government and first nation's groups.  
Ability to multi-task in a high stress environment.  
Have held up to Secret Security Clearance  
Inuvialuit Beneficiary. (Inuit First Nation)

## Experience:

May 2010 to  
Present

Beausoleil First Nation  
Director of Capital and Public Works  
Christian Island, ON

Director of Housing, Lands, Roads, Waste, Economic Development, Fire, Emergency Operations, Water, Lands and Natural Resources, Ferries, Parks & Rec., and Capital.

O & M budgets in excess of \$ 5.5 Million.  
All Capital projects for all departments including Education, Social Services, Health, and Administration  
Oversaw health and safety as well as emergency planning.  
Briefing notes to Chief and Council.  
Secured funding agreements with Federal and Provincial Agencies as well as CMHC.  
Directly Managed 50 + Management and Staff  
Community Emergency Management Coordinator  
Capital projects in excess of \$ 50 Million

July 2009 to  
May 2010

Nunatsiavut Government  
Property Manager – Project Manager – Maintenance Manager

Nain, Labrador

Answered directly to Deputy Minister of Aboriginal Affairs,  
Capital budget \$ 30 Million  
O & M Infrastructure budget for all government departments  
Briefing notes for DM and Executive Council  
5 year planning with Ministers and DM's  
Co-ordinated infrastructure planning with Community  
Governments.  
Senior Management planning dealing with Nunatsiavut  
Affairs, Culture, Health, Language, Seniors,  
Environment, and Natural Resources.  
Overseeing staff and contractors in 7 communities.  
Completed design and construction of Torngat Mountain  
National Park base camp  
Project manager for 52 office corporate headquarters in Nain  
Project manager for new Legislative Assembly in Hopedale

May 2006 to  
June 2009

Government of the NWT  
Arctic Turn Young Offenders Facility  
Youth Officer

Inuvik NT

- Security clearance.
- Supervision and development of residents.
- Provide safe and secure custody of residents.
- Assist with Programming for residents to provide opportunities for rehabilitation

2005  
To April 2006

Inuvialuit Development Corporation  
Property Manager

Inuvik NT

- Capital budget over \$ 5 Million
- O &M budget in excess of \$ 3.5 Million.
- Negotiated contracts and leases.
- Planned, Budgeted, and Construction of new facilities and Renovations.
- Helped with property needs of Inuvialuit Corporate Group including build to suite contracts.
- 6 full time staff and up to 15 seasonal staff.

- |                             |  |               |
|-----------------------------|--|---------------|
| April 2004<br>To Jan 2005   | Inuvialuit Development Corporation<br>Maintenance Manager  | Inuvik NT     |
|                             | <ul style="list-style-type: none"> <li>• Initiated preventative maintenance program.</li> <li>• Set up carpentry apprenticeship program.</li> <li>• Capital and maintenance budget in excess of \$ 5 million.</li> <li>• Maintenance and upkeep of 25 building in 3 communities mix of residential, special needs, and office complex units.</li> <li>• Staff training and development.</li> </ul>   |               |
| April 1989<br>To March 2004 | Nanaimo Port Authority<br>Property Division  | Nanaimo BC    |
|                             | <ul style="list-style-type: none"> <li>• Performed maintenance and general upkeep of all port property including landscaping and leased facilities.</li> <li>• Supervised construction, repair, liaised with contractors and evaluated work progress.</li> <li>• Quotes and purchasing for Maintenance Department.</li> <li>• Supervised summer staff.</li> <li>• Performed marina supervisor duties for holiday relief.</li> <li>• Marine Firefighter and Emergency Responder.</li> <li>• Trained in oil spill containment and recovery.</li> <li>• Incident commander on a number of major emergencies.</li> </ul> |               |
| June 1987<br>To Sept. 1987  | Transport Canada / Inuvik Airport<br>Clerk III Temporary Post  | Inuvik N.W.T. |
|                             | <ul style="list-style-type: none"> <li>• Completed all office and clerical duties.</li> <li>• Set up new office procedures to rectify problems.</li> <li>• Security Supervisor for Airport security.</li> <li>• Handled aviation shipping and receiving.</li> <li>• Administrator for terminal leases.</li> <li>• Full Transport Canada security clearance required for post.</li> </ul>   |               |
| Sept. 1984<br>To Dec. 1985  | Ram Air Charter Ltd.<br>Operations Manager   | Inuvik N.W.T. |
|                             | <ul style="list-style-type: none"> <li>• Organized and completed all general office duties.</li> <li>• Responsible for accounts receivable, accounts payable, and payroll.</li> <li>• Facilities manager with control of staff housing, terminal operations, maintenance hangers, and airport</li> </ul>   |               |

June 1980 To Sept. 1984	Ram Air Charter Ltd. Office clerk / Dispatcher – summer staff	Inuvik N.W.T.
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- Worked every summer while attending high school.
- Contributed to all aspects of office procedures.
- Performed duties such as ticket agent, aircraft dispatch, booking charters, and cash outs.
- General airport maintenance using a number of heavy equipment machines.

## Volunteer Work:

June 2010 to Present	Beausoleil Fire Service Firefighter	Christian Island ON
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March 1999 To March 2004	Nanaimo Fire Dept. / Station 5 Firefighter	Nanaimo BC
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- Fully trained firefighter
- First responders first aid level III
- Elected treasurer for Harwood Volunteer Fire Dept. Association in 2002.
- Trained in disaster emergency response and incident command.

Aug 1998 To Aug 2002	International Longshore and Warehouse Union Shop Stewart Local 517	Nanaimo BC
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- Negotiated 2 collective agreements
- Helped rectify problems between the employees and the Nanaimo Port Authority.
- Helped to maintain a good working and safe environment for all staff.

## Education:

April 2006	BOMI Real Property Administration designation.
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Sept. 2002 To present	Enrolled in 2 <sup>nd</sup> year of CGA Canada's program of professional accounting studies
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1986 – 1988	Malaspina University College Completed courses majoring in commerce.
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Various Training

- Survival First Aid.
- Emergency Medical Responder Certification
- Standard first aid.
- WHIMIS.
- Oil spill containment and recovery.
- Marine Radio License.
- Class ACZ Drivers License with air endorsement.
- Provincial Travel Counselors Certificate issued by Tourism Nanaimo.
- Certified foster parent.
- Community Emergency Management Coordinator Designation (Ontario)

References: Available on request.



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

### Background

The AFNWA Business Case recommends a phased milestone-based approach with a two-year transitional period that allows detailed operational and capital budgets to be developed and agreed with ISC based upon an AFNWA operations plan; an Asset Management Plan (AMP); and a 10-year capital program.

The AFNWA has developed a Transition Plan which has been the principle vehicle for agreeing to a Framework Agreement between AFNWA and ISC. This plan which is organized into three key phases includes several steps that need to be delivered sequentially. These phases can be summarized as follows

- **Phase 1: Approval & Funding:** is an enabling phase which includes tasks which must be completed to allow the AFNWA to take on additional operational responsibility in 2020.
- **Phase 2: Operational Initiation:** comprises establishing the AFNWA management team in a staged manner to prepare for the ownership and operation of the participating First Nations water and wastewater assets
- **Phase 3: AFNWA Formation:** comprises the formalization of the AFNWA budget planning and consolidates these into a Funding Model. The funding requirements will be subject to negotiation with ISC with the understanding that the level of funding will be in line with the order of cost identified in the AFNWA business case.

AFNWA and ISC are close to completing a funding agreement which will provide the funds needed to deliver the Transition plan and progress over the next two years.

### Transition Period Implementation Plan

The Transition Period Implementation Plan (Implementation Plan) will guide the overall operationalization of the AFNWA and its phases will lead to fully autonomous operations in Spring 2022. It will describe the objectives of the phases and the process by which the steps and composite tasks are to be managed.



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

The delivery of the Implementation Plan will necessitate a team with diverse knowledge, expertise, and experience. The Implementation Plan contains the information needed to deliver the transition successfully, in terms of integration, communication, quality, cost, schedule, risk, scope, and overall project management. The Implementation Plan defines the governance and organizational structure; the management, administrative, and reporting processes that will be used; and the decision-making responsibilities and authorities for each principal stakeholder.

While Implementation Planning has commenced, finalizing and delivery of the Plan will require the input from the Senior Management Team which has yet to be recruited. The immediate intention of the Plan is to identify the relevant tasks that need to be completed but not to provide the complete details on how they will be delivered. While it is recognized that the CEO will have ultimate accountability for delivery of the Implementation Plan, potential resources required to develop tasks (whether internal or external resources), and reviewer / approver information has been added for considerations.

As each task is formally initiated, it is recommended that the AFNWA initiate further project definitions (i.e. project charter, timing, resources) to guide task implementation. Within the Transition Plan, tasks anticipated to require a formal project charter or workplan are marked with an asterisk (\*). As individual tasks are initiated, additional task implementation planning is anticipated, and this will be reviewed by the CEO and Senior Management Team on a regular basis.



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

Phase 1: Approval and Funding.					
<b>Step 1a: Operational Funding</b>					
Funding Commitment by Government of Canada to provide long term funding to AFNWA in line with the order of cost identified in the Business Case.					
Noting that long term funding will come with final negotiation at the end of this two-year transition. Execution of the Transitional Funding Agreement and signature of the Framework Agreement will signify commitment to this objective.					
Tasks	AFNWA Owner	Resources <sup>1</sup>	Reviewer /Approver	Recommended Completion Date	
1.0	Framework agreement signed demonstrating a co-development process and commitment for long-term AFNWA funding (key milestone)	COO	CY, RB, Colliers	ISC	May 15, 2020
2.0	Complete Transitional Funding Agreement between AFNWA and ISC to cover two-year Transition Period	COO	CY, RB, Colliers	ISC	May 1, 2020
3.0	Cash flow draw system (incl. bank number), schedule (refer to ISC conference call minutes)	COO	RM	ISC	May 15, 2020
4.0	Develop Transition Plan Template	COO	Colliers	CEO	May 15, 2020

<sup>1</sup> A full description of resource abbreviations has been provided following the phase 3 tasks.



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

Phase 1: Approval and Funding.					
<b>Step 2: Planning and establish governance</b>					
Funding Commitment by Government of Canada to provide long term funding to AFNWA in line with the order of cost identified in the Business Case.					
Noting that long term funding will come with final negotiation at the end of this two-year transition. Execution of the Funding Agreement and signature of the Framework agreement will close step 1					
Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date	
1.0	Establish organization				
1.1	CEO	COO, McInnis Cooper	Board	August 1	
1.2	CEO	COO, SMT	CEO	Ongoing	
1.3	COO	RM	CEO	Dec. 31, 2020	
2*	Identify corporate policies and procedures needed				As req'd on a priority basis
2.1	Mgr. Comms	COO, RM	Board		
2.2	CEO	COO, McInnis Cooper, Mgr. CS, Colliers	Board		
2.3	CEO	Mgr. CS, COO	Board		
2.4	CEO	Mgr. CS, COO	Board		



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

2.5	Information Technology	Mgr. CS	COO, JH	CEO	
2.6	Training and Development policy (Parts found within the APC HR Policy)	Mgr. CS	COO, Supervisor CS, RM	CEO	
2.7	Discipline policy (incl. Two Eyed Seeing)	COO	McInnes Cooper, Elders Council, JP, RB	CEO	
2.8	Pension and Benefits policy	CEO/Mgr. CS	McInnes Cooper, Supervisor CS	Board	
2.9	Health and Safety policy	CEO	Mgr. CS, COO, Supervisor CS, JH	Board	
2.10	Environmental policy	CEO	SMT, GG	Board	
2.11	Security policy	CEO	SMT	Board	
2.12	Code of Conduct	CEO	McInnes Cooper, Mgr. CS, COO, RM	Board	
2.13	Debt policy (elements found within the Financial Policy)	Mgr. CS	COO, CEO, Colliers	Board	
2.14	Spending Authority (Financial Policy, will need to be altered)	CEO	Mgr. CS, COO, Colliers	Board	
2.15	Fraud (Elements found within the APC Financial Policy)	Mgr. CS	COO, CEO, Colliers	Board	
2.16	Document Management policy, recommended solution, and tool considerations (utilize APC in interim)	COO	SMT, Colliers JH, RM	CEO	
2.17	Violence and Harassment policy	CEO	McInnes Cooper, Mgr. CS, COO	Board	
2.18	Hiring policy	COO	JH	CEO	
2.19	Conflict of Interest Policy	CEO	COO, Mgr. CS, Colliers	Board	
2.20	Develop AFNWA specific templates - minutes, action list, SOPs	COO	RM, JH, Colliers	CEO	
3.0	Establish financial and accounting policies and frameworks				



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

3.1	Identify Gaps in APC Financial Policies - debt policies, accounting structures being used, align with Treasury Board policies / rates,	Mgr. CS	COO, Colliers	CEO	
3.2	Set up basic accounting framework, general ledger, yearly audit standards & audit timelines, income statements, balance sheets – (service may start with APC but transition to AFNWA) - services could be provided on an interim basis by APC; - there are # of other corporate services APC can provide; gradual transition to AFNWA	Mgr. CS	COO, 3 <sup>rd</sup> party advisor, Colliers	CEO	Establish for first fiscal year [2020/2021]
3.3	Tax exemption letters from CRA - anticipated to be received once a lease is signed	COO	Mgr. CS,	CEO	June 1, 2020
3.4	Audited statements 2021 (milestone)	Mgr. CS	COO, CEO, Colliers	Board	July 31, 2021
4.0*	Board governance				
4.1	Establish Board Governance Framework - solicit consultant proposal - develop work plan	CEO	COO, RB, Colliers	Board	
4.2	AFNWA Implementation Plan - Board delegated resp. to CEO to manage - CEO owns plan; recommendations to the Board, as req'd - COO & Board Executive work with CEO - Board approves key items	CEO	COO, RB, Colliers	CEO	March 31, 2022
4.3	AFNWA Board Terms of Reference - CEO works with Board executive, legal advice - Incl. governance (i.e. operating water authority, approvals & authorities), roles (i.e. day to day)	CEO	COO, JP, RB	Board	Initiates with hiring of CEO, completes Nov 2020
4.4	Board governance Workshop (Face to Face) - Define roles and resp, Specific Board terms, committee, compensation	COO	RB, Colliers	CEO	Sept/Oct. 2020



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

4.5	AFNWA Board and Committees Terms of Reference [e.g. Executive, Audit and Finance, Environment, Health and Safety]	CEO	COO, RB, Colliers	Board	Draft Nov. 30/20
4.6	AFNWA Board Formally Approves Term of Reference (milestone)	CEO	COO, RB	Board	Feb.1, 2021
4.7	Board Compensation Policy	CEO	COO, RB	Board	April 1, 2021
4.8	Selection of Elders Council, develop Terms of Reference - Process for Board to engage with Elders Council - Lead/ Head Elder? Ex-officio to Board? Serve as Director on Board?	CEO	COO, RB	Board	March 1, 2021
5.0*	Establish document management system	COO	JH, Colliers, RM	CEO	Dec. 31, 2020
6.0	Develop communications strategy	Mgr. Comms	COO, Comms Consultant	CEO	Feb 1, 2021
7.0	Define ISC approvals process				
7.1	Develop engagement plan with ISC - Strategy and framework of approach - Meeting schedule and intent - Identify and clarify requirements	COO	RB, McInnis Cooper,	CEO	February 1, 2021
7.2	Identify milestones and approvals (required by Federal government) - Schedule, process, Cabinet date, timeline, milestones, minutes & action list	COO	RB, Colliers, Central Agency reps,	CEO	As Req'd
7.3	Identify Board approvals and reporting required - Tied to ISC negotiations	COO	RM, Colliers	CEO	As Req'd



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

Phase 1: Approval and Funding.					
Step 3a: Band Council Resolutions					
<p>The commitment to GOC funding will allow Band Council Resolutions (BCR) to be completed with participating First Nations Bands. This deliverable will require the AFNWA interim COO to travel to participating and non-participating First Nations alike to request a BCR for further continuation of the project. This will allow license and asset transfer agreements to be developed. This step is dependent on the signature of the proposed framework agreement before the community visits commence.</p>					
Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date	
1.0					
1.1					
1.1	COO	McInnes Cooper, ISC	CEO, Board, Band Council	Jun 30, 2020	
1.2	COO	RB, Colliers	CEO		
1.3	CEO	COO	Board		
1.4	Mgr. Eng.	COO, JH	CEO		
1.5	COO		CEO	Jun 30, 2020	
1.6	COO	RB,	CEO	Fall 2020 or Winter 2021 depending on Pandemic Restrictions	



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

2.0	BCR approval by communities				
2.1	Organize Community visits - present to Councilors, gain input, make changes / tweaks. This round of BCRs will signify a further commitment to the AFNWA. AFNWA COO and CEO will travel to each community to present to Chief and Council to seek their continued support [22 communities].	COO	RB, RM	CEO	Fall 2020 / Winter 2021
2.2	Request signature - by community based on meeting with Councils - Presentations to communities	COO	CEO (as req'd), Mgr. Comms	CEO, Band Council	As Req'd
2.3	Renew BCR commitments for existing Communities (15 + 7 communities).	COO		CEO	January 31, 2021
3.0	Outreach to other communities to extend invitation to join AFNWA (note: dependent on Framework Agreement)	CEO	COO	CEO	Ongoing up to Dec 1, 2021
4.0	Develop draft BCR process & commitments for communities to join AFNWA after Transfer Agreement - Process to be defined - Resources to be identified in negotiations with GoC	COO	McInnes Cooper, RB	CEO	Winter 2021/2022



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

### Phase 1: Approval and Funding.

#### Step 3b: Implement Human Resources Strategy

The recruitment of a CEO and senior management team is key to delivering phase 2. Obtaining GOC commitment to funding will allow the following activity to commence.

- Contract with a professional search organization
- Hire the CEO and senior managers

These manager positions will have to be selected in order of priority. For 2020-2021, however, it is recommended that the CEO and Manager of Engineering be identified to work alongside the interim COO. At the start of 2021-2022, the remainder of the senior management team will be hired.

Note – Current COO continues to play a strong liaison role with First Nation Chiefs, Board, ISC, and communities; supports CEO as the utility transitions to full operations in 2022.

Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date
1.0 Human Resource planning				
1.1 Develop Human Resource strategies that recognize the experience and knowledge of staff currently employed in water and wastewater system operation and take a consistent approach to salaries, benefits, training, and career development. Confirm skills to operate business	Mgr. CS	COO, Supervisor CS, JH	CEO	Sept 1, 2021
1.2 Research pay and compensation (internal and external equity) - Seek outside HR consultant support	CEO	Mgr. CS, COO	CEO	Summer / Fall 2020
1.3 Develop and complete draft CEO job description	CEO	COO	Board	May 15, 2020
1.4 Develop and complete SMT job descriptions	COO	JH, RM	CEO	As Req'd
1.5 Develop and complete staff job descriptions	Mgr. CS	SMT, Supervisor CS	CEO	As Req'd



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

2.0	Formal staff recruiting				
2.1	Complete RFP for professional recruiting firm	COO	CEO, RM	CEO	April 28/20
2.2	Hire a professional recruiting firm to recruit qualified personnel as candidates for Senior Management positions.	COO	CEO, RM	CEO	May 22/20
3.0	Recruit key staff				
3.1	Recruit (Interim) CEO for 2-year transition	Board	COO	Board	July 2020
3.2	Recruit Manager Engineering (permanent)	CEO	COO, Recruitment Consultant		September 1, 2020
3.3	Recruit Manager Communications & Outreach (permanent)	CEO	COO, Recruitment Consultant		Dec. 1, 2020
3.4	Recruit Manager of Corporate Services (permanent)	CEO	COO, Recruitment Consultant	CEO	January 1, 2021
3.5	Recruit Manager Operations (permanent)	CEO	COO, Recruitment Consultant	CEO	April 1, 2021
3.6	Hire asset management technologist	Mgr. Eng.	COO, JH	CEO	Sept. 1, 2020
3.7	Hire admin assistant	COO	Mgr. Eng., RM	CEO	Oct. 1, 2020
3.8	Recruit or hire superintendents	Mgr. Op	Mgr. CS, JH	CEO	June 1, 2021
3.9	Recruit permanent CEO	Board	Interim CEO, COO	Board	April 30, 2022



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

Phase 1: Approval and Funding.					
Step 4: License Agreements					
Finalizing BCRs will enable licensing/land access agreements to be drafted and completed with participating First Nations Bands. The AFNWA and its legal team will work directly with First Nations lands departments, ISC, the Department of Justice to create land access/license agreements that will both allow the AFNWA to enter communities, exclusively work on water and wastewater infrastructure, and indemnify Chiefs and Councils for water quality.					
Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date	
1.0					
1.1					
1.2					
1.3					
2.0					
2.1					



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

	<ul style="list-style-type: none"> <li>two options to be considered</li> </ul>				
2.2a	Option 1- Existing community mapping, or minimum required being the list of assets that are required	Mgr. Eng.	COO, Band land manager, ISC, McInnes Cooper	CEO	December 1, 2020
2.2b	Option 2 - Mapping in connection with Asset Management Plan, Identify or confirm assets, surveyors land in question, geomatic scanning (or is this part of the AMP)	Mgr. Eng.	COO, Band land manager, ISC, McInnes Cooper	CEO	December 1, 2020
3.0	License agreements				
3.1	<p>License agreements engagements</p> <ul style="list-style-type: none"> <li>interested community representatives</li> <li>identify elements that will used for AFNWA commitment through BCR</li> </ul>	COO	McInnes Cooper, RB		Fall 2020
3.2	<p>Draft license agreements</p> <ul style="list-style-type: none"> <li>Generally common, accompanied with a map</li> </ul> <p>Specifics based on band (i.e. municipal transfer agreement)</p>	COO	McInnes Cooper, RB	Band Council/CEO Board /	January 1, 2021
3.3	<p>Group engagements follow up, land workshops</p> <ul style="list-style-type: none"> <li>Land reps from interested communities</li> <li>Presenting final draft</li> </ul>	COO	ISC, McInnis Cooper, RB, Band Council, Community	CEO	
3.4	Recommend license agreement for final approval to the Board (combine with below)	CEO	COO, RB, McInnis Cooper, Band Council	Board	April 1, 2021
3.5	<p>Signature of license agreements</p> <ul style="list-style-type: none"> <li>Confirm whether condition of final funding</li> </ul>	CEO	COO, RB, McInnes Cooper, Band Council	Band Council/ Board	July 1, 2021



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

### Phase 2: Operational Initiation.

#### Step 5: Implement an FSD “Hub and Spoke” operations model.

Hire all senior staff by April 2021 (one year after funding approval) with a clear preference to hire from participating Atlantic First Nations. The tasks of these managers will be to develop and adopt a formal training and development program for all staff. Furthermore, senior managers will develop Human Resource strategies that recognize the experience and knowledge of staff currently employed in water and wastewater system operation and take a consistent approach to salaries, benefits, training, and career development.

The development and implementation of the hub and spoke model is conditional upon the input of the Senior management team. When the SMT is in place a detailed implementation plan for this step will be developed.

Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date
1.0 Ontario Clean Water Agency (OCWA) Peer Review Business Case	COO	CEO, OCWA, JH, Colliers	ISC	Fall 2020
2.0 ISC accepts the Business Case (milestone)	CEO	COO, Colliers, JH	Board / ISC	April 1, 2021
3.0 Develop plan to implement hub and spoke model <ul style="list-style-type: none"> <li>- i.e. supervisor allocation, technical supervisor set up, connections to HR strategies</li> <li>- consultation with future operators, Board, communities,</li> <li>- financials</li> </ul>	Mgr. Ops	SMT, JH,	CEO	Sept. 1, 2021
4.0 Regular updates to Board For information	CEO	SMT, COO	Board	Monthly



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

<b>Phase 2: Operational Initiation.</b>					
<b>Step 6: Implement Transition Management.</b>					
AFNWA appoint a dedicated transition management team. Develop an AFNWA transition management strategy and align the communications and transition management strategies to ensure effective engagement and support. This step will be maintained for the 2-year transition period.					
Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date	
1	AFNWA appoint a dedicated Transition Management Team (TMT) to navigate change with external consultant as support.	SMT	COO, RB, Colliers	CEO	Starting April 2021
2*	Develop and implement Transition Management Plan - Establish transition management milestones with AFNWA, communities, Government, operators, others	SMT	COO, RB, Colliers	CEO	From June 1, 2021 to end of 2023

<b>Phase 2: Operational Initiation.</b>					
<b>Step 7: Regulatory Oversight.</b>					
AFNWA confirm regulatory Oversight Agencies with GOC. and develop a plan for implementing their requirements. As an interim step, the AFNWA and Dalhousie University will continue their work in developing a strategy for operating in an unregulated environment.					
Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date	
1*	Regulatory oversight planning				



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

1.1	AFNWA and Dalhousie University will continue their work in developing water safety plans for operating in the interim within an unregulated environment. - NSERC application - Proposal consideration	CEO	COO, GG, ISC, Mgr. Eng., Mgr. Ops, JH	CEO	April 1, 2021
1.2	Develop (interim step) potential set of processes to facilitate auditing for compliance to benchmark standards (updated from original 2013 regulations prepared by Dalhousie)	Mgr. Ops	SMT, GG, JH,	CEO	Sept 30, 2021
1.3	Adoption of interim regulations	Mgr. Ops	SMT, GG, JH	Board	June 30, 2021
2.0	Determine long term regulations (influenced significantly by the work being conducted by the Assembly of First Nations)	CEO	SMT	Board	As Req'd
3.0	Work with Federal Government to determine Water Quality and Wastewater Effluent regulator (Environment Canada). Develop strategies to gain Public Servant support.	CEO	SMT, GG, ISC	Board	Sept. 1, 2021
4.0	Determine Federal financial regulator	CEO	SMT, ISC	Board	June 1, 2021
5.0	Review current composition / recruitment of additional board members				
5.1	Additional band representation	Board Executive	CEO, COO, RB	Board	As Req'd
5.2	Additional technical, SME experts - Financial, communications, legal, scientific etc....	Board Executive	CEO, COO, JH, Colliers	Board	April 1, 2021
5.3	Appointment of a Vice Chair	COO	Board Chair	Board	May 15, 2020



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

Phase 2: Operational Initiation.					
Step 8: Operational planning.					
Senior Management team develop an operations plan that identifies AFNWA operational funding requirements including:					
<ul style="list-style-type: none"> <li>board and management costs,</li> <li>operating and maintenance costs</li> <li>administration and accommodation costs,</li> </ul>					
Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date	
1.0	AFNWA headquarters facility				
1.1	Develop Headquarters accommodation, space, and technical requirements (Search criteria)	COO	RM, Colliers	CEO	June 1/20
1.2	Search for headquarters accommodation on reserve. Enables temporary (medium term; 5-7 years) vs eventual construction (long term), incorporates Board direction	COO	RM, Colliers, Band Land Manager	CEO	August 1/20
1,3	Develop and Secure IT requirements, office equipment, furniture etc. Note: staged IT requirements may be required as full IT Policy will be finalized with the engaged of the Director Corporate Services.	COO	Mgr. Eng., RM, JH	CEO	Oct. 1/20
1.4	Lease & financial impact review	COO	COO, McInnes Cooper,	CEO	Sept. 1/20
1.5	Board lease approval	CEO	COO	Board	Sept.1/20
1.6	Move in to headquarters facility	COO	RM, Contractor	CEO	Oct.1/20
2.0	Develop Operations budget for 2021/22 fiscal year	Mgr. CS	SMT, COO	CEO	March 1/21
3.0	Develop Operational Plan for commencement of operations	Mgr. Ops	SMT, COO, Consultant	CEO	Jan 31/22



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

Phase 2: Operational Initiation.					
Step 9: Capital planning.					
The implementation of step 5 will allow Senior Management to develop an asset management plan within 18 months of AFNWA operations and a draft 10-year capital program based on the asset management plan. This further emphasizes the need to retain the AFNWA CEO and Manager of engineering within the first quarter of 2020-2021					
Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date	
1.0*	Identify what is required specifically for the Asset Management Plan (AMP) plan	Mgr. Eng.	COO, JH,	CEO	Sept 1, 2020
	<ul style="list-style-type: none"> <li>Develop project charter including schedule, scope etc.</li> <li>Project requirements</li> <li>Required consultant requirements</li> </ul>				
2.0	Develop and issue RFP for consultant to support development of AMP and 10-year capital budget.	Mgr. Eng.	Consultant, JH,	CEO	Sept 30, 2020
3.0	Organize an Asset Management Workshop for operators and technical staff of the AFNWA.	Mgr. Eng.	Consultant, Mgr. Ops, JH,	CEO	March, 2021
4.0	Develop a comprehensive AMP for the infrastructure in participating communities.	Mgr. Eng.	Consultant, SMT, JH	CEO	Sept. 30, 2021
5.0	Develop a draft 10-year capital plan that is based on the asset management plan.	Mgr. Eng.	Consultant, SMT Colliers. JH	CEO	Dec 31, 2021



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

Phase 3: Detailed Business Case and Funding					
Step 10: Risk assessment.					
<p>Prepare a detailed risk assessment to act as an input into the detailed financial model. This will be an ongoing practice within the AFNWA. The asset management plan will identify detailed operational risks; however, it will be the prerogative of the AFNWA senior management to identify additional risks along with the appropriate mitigation strategy. Risks categories may include but are not limited to:</p> <ul style="list-style-type: none"> <li>• Economic</li> <li>• Social</li> <li>• Political</li> <li>• Technological</li> <li>• Legal</li> <li>• Environmental</li> </ul>					
Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date	
1.0	Develop and issue RFP to develop Enterprise Risk Management System - Proposal consideration / external consultant	Mgr. CS	CEO, SMT, COO, Colliers	CEO	Jun 1, 2021
2.0	Complete Enterprise Risk Management System for Approval of Board - Workshops with Board, SMT - Risk register - Timelines for review	CEO	SMT, Consultant, COO, JH, RM	Board	Nov 30, 2021



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

Phase 3: Detailed Business Case and Funding					
<b>Step 11: Financial Model.</b>					
Develop a detailed financial model that incorporated inputs from the AMP, Operational plan, risk assessment and 10-year capital spending plan to identify the operational and capital funding required to operate the AFNWA for the first 25 years of operation. The model should be sufficiently detailed to consider scenarios and risks which might impact operations and service delivery. The model will be a vehicle for agreeing the funding model with GOC.					
Complete Step 11 Mar 2021					
Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date	
1.0	Incorporate inputs from the AMP, Operational Plan, risk assessment and 10-year capital spending plan to identify the operational and capital funding required for the AFNWA.	Mgr. CS	SMT, Colliers	CEO	Mar 1, 2022
2.0	Finalize financial reporting				
2.1	Develop corporate financial reporting, models (operations and capital) - Management information required. - External reporting (i.e. GoC) requirements	Mgr. CS	COO, Colliers	CEO	March 30, 2022



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

<b>Phase 3: Detailed Business Case and Funding</b>					
<b>Step 12: Refine Detailed Budgets and funding model.</b>					
The intention of this step is to review the detailed financial model and risk assessment with ISC and Participating First Nations to develop/agree a detailed funding model.					
Complete Step 12 June 2021					
Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date	
1.0	Review the detailed financial model with ISC and Participating First Nations to develop/agree on a detailed funding model - Informed by multiple sources including the enterprise risk management system	Mgr. CS	SMT, Colliers	Board, ISC Band Councils	Mar 1, 2022
2.0	Develop Business Plans for AFNWA Board Approval	CEO	SMT, COO	Board	
2.2	Determine Business Plans draft Table of Contents	CEO	SMT, ISC	Board	June 1, 2021
2.3	Ten Year Business Plan	CEO	SMT, COO	Board	Jan. 31, 2022
2.4	One Year Business Plan	CEO	SMT, COO	Board	Feb.28, 2022



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

Phase 3: Detailed Business Plan and Funding					
Step 13 Transfer Agreement.					
Transfer Agreement will coincide with the date of AFNWA full autonomous operation. The Transfer agreement will include the agreed funding model and will address how changes such as future upgrades to regulations will be dealt with.					
Tasks	AFNWA Owner	Resources	Reviewer /Approver	Recommended Completion Date	
1.0 Determine method of funding - Order and Council; and / or - 10-year grants	CEO	SMT, ISC, COO	Board / ISC	Dec. 1, 2021	
2.0 Define Transfer Agreement financial/liability requirements - Constituent parts	CEO	SMT, COO, ISC, McInnes Cooper	Board / ISC	Dec. 1, 2021	
3.0 Final Detailed Funding Model Approval By Board	CEO	SMT, Colliers	Board	Mar 1, 2022	
4.0 The Transfer Agreement (GoC) will include the agreed funding model, regulatory oversight requirements and address how changes such as future upgrades to regulations will be dealt with - Define requirements - Will reference several documents (BCR's, License Agreement, Business Plans, regulators etc.)	CEO	SMT, ISC, COO, McInnes Cooper	Board / ISC	Spring 2022	



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## Atlantic First Nations Water Authority Transition Period Implementation Plan

### Resource Legend

COO – James MacKinnon	Mgr. CS – Corporate Services	Mgr. Ops - Operations	CY – Carl Yates	Colliers – Representatives based on expertise	JH – Jamie Hannam
RM – Rayleen MacDonald	Mgr. Comms – Communications & Outreach	Mgr. Eng. - Engineering	RB – Rod Burger		GG – Graham Gagnon
JP – John Paul	SMT - describe	TMT – members of SMT as assigned			

# James E. Trimble RPA

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Tiny, ON  
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Home (705) 812-0646  
Cell (705) 529-8097  
E-mail james.trimble2@gmail.com

## Highlights:

BOMI Real Property Administrator Designation.  
Community Emergency Management Coordinator (ON)  
2<sup>nd</sup> Year CGA Accounting Program.  
Familiar with a variety of computer software programs.  
Extensive knowledge in property management, project management, staff training and development, maintenance, marine infrastructure, and northern construction.  
Knowledge in working within and between all levels of government and first nation's groups.  
Ability to multi-task in a high stress environment.  
Have held up to Secret Security Clearance  
Inuvialuit Beneficiary. (Inuit First Nation)

## Experience:

May 2010 to  
Present

Beausoleil First Nation  
Director of Capital and Public Works  
Christian Island, ON

Director of Housing, Lands, Roads, Waste, Economic Development, Fire, Emergency Operations, Water, Lands and Natural Resources, Ferries, Parks & Rec., and Capital.

O & M budgets in excess of \$ 5.5 Million.  
All Capital projects for all departments including Education, Social Services, Health, and Administration  
Oversaw health and safety as well as emergency planning.  
Briefing notes to Chief and Council.  
Secured funding agreements with Federal and Provincial Agencies as well as CMHC.  
Directly Managed 50 + Management and Staff  
Community Emergency Management Coordinator  
Capital projects in excess of \$ 50 Million

July 2009 to  
May 2010

Nunatsiavut Government  
Property Manager – Project Manager – Maintenance Manager

Nain, Labrador

Answered directly to Deputy Minister of Aboriginal Affairs,  
Capital budget \$ 30 Million  
O & M Infrastructure budget for all government departments  
Briefing notes for DM and Executive Council  
5 year planning with Ministers and DM's  
Co-ordinated infrastructure planning with Community  
Governments.  
Senior Management planning dealing with Nunatsiavut  
Affairs, Culture, Health, Language, Seniors,  
Environment, and Natural Resources.  
Overseeing staff and contractors in 7 communities.  
Completed design and construction of Torngat Mountain  
National Park base camp  
Project manager for 52 office corporate headquarters in Nain  
Project manager for new Legislative Assembly in Hopedale

May 2006 to  
June 2009

Government of the NWT  
Arctic Turn Young Offenders Facility  
Youth Officer

Inuvik NT

- Security clearance.
- Supervision and development of residents.
- Provide safe and secure custody of residents.
- Assist with Programming for residents to provide opportunities for rehabilitation

2005  
To April 2006

Inuvialuit Development Corporation  
Property Manager

Inuvik NT

- Capital budget over \$ 5 Million
- O &M budget in excess of \$ 3.5 Million.
- Negotiated contracts and leases.
- Planned, Budgeted, and Construction of new facilities and Renovations.
- Helped with property needs of Inuvialuit Corporate Group including build to suite contracts.
- 6 full time staff and up to 15 seasonal staff.

- |                             |  |               |
|-----------------------------|--|---------------|
| April 2004<br>To Jan 2005   | Inuvialuit Development Corporation<br>Maintenance Manager  | Inuvik NT     |
|                             | <ul style="list-style-type: none"> <li>• Initiated preventative maintenance program.</li> <li>• Set up carpentry apprenticeship program.</li> <li>• Capital and maintenance budget in excess of \$ 5 million.</li> <li>• Maintenance and upkeep of 25 building in 3 communities mix of residential, special needs, and office complex units.</li> <li>• Staff training and development.</li> </ul>   |               |
| April 1989<br>To March 2004 | Nanaimo Port Authority<br>Property Division  | Nanaimo BC    |
|                             | <ul style="list-style-type: none"> <li>• Performed maintenance and general upkeep of all port property including landscaping and leased facilities.</li> <li>• Supervised construction, repair, liaised with contractors and evaluated work progress.</li> <li>• Quotes and purchasing for Maintenance Department.</li> <li>• Supervised summer staff.</li> <li>• Performed marina supervisor duties for holiday relief.</li> <li>• Marine Firefighter and Emergency Responder.</li> <li>• Trained in oil spill containment and recovery.</li> <li>• Incident commander on a number of major emergencies.</li> </ul> |               |
| June 1987<br>To Sept. 1987  | Transport Canada / Inuvik Airport<br>Clerk III Temporary Post  | Inuvik N.W.T. |
|                             | <ul style="list-style-type: none"> <li>• Completed all office and clerical duties.</li> <li>• Set up new office procedures to rectify problems.</li> <li>• Security Supervisor for Airport security.</li> <li>• Handled aviation shipping and receiving.</li> <li>• Administrator for terminal leases.</li> <li>• Full Transport Canada security clearance required for post.</li> </ul>   |               |
| Sept. 1984<br>To Dec. 1985  | Ram Air Charter Ltd.<br>Operations Manager   | Inuvik N.W.T. |
|                             | <ul style="list-style-type: none"> <li>• Organized and completed all general office duties.</li> <li>• Responsible for accounts receivable, accounts payable, and payroll.</li> <li>• Facilities manager with control of staff housing, terminal operations, maintenance hangers, and airport</li> </ul>   |               |

June 1980 To Sept. 1984	Ram Air Charter Ltd. Office clerk / Dispatcher – summer staff	Inuvik N.W.T.
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- Worked every summer while attending high school.
- Contributed to all aspects of office procedures.
- Performed duties such as ticket agent, aircraft dispatch, booking charters, and cash outs.
- General airport maintenance using a number of heavy equipment machines.

## Volunteer Work:

June 2010 to Present	Beausoleil Fire Service Firefighter	Christian Island ON
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March 1999 To March 2004	Nanaimo Fire Dept. / Station 5 Firefighter	Nanaimo BC
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- Fully trained firefighter
- First responders first aid level III
- Elected treasurer for Harwood Volunteer Fire Dept. Association in 2002.
- Trained in disaster emergency response and incident command.

Aug 1998 To Aug 2002	International Longshore and Warehouse Union Shop Stewart Local 517	Nanaimo BC
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- Negotiated 2 collective agreements
- Helped rectify problems between the employees and the Nanaimo Port Authority.
- Helped to maintain a good working and safe environment for all staff.

## Education:

April 2006	BOMI Real Property Administration designation.
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Sept. 2002 To present	Enrolled in 2 <sup>nd</sup> year of CGA Canada's program of professional accounting studies
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1986 – 1988	Malaspina University College Completed courses majoring in commerce.
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Various Training

- Survival First Aid.
- Emergency Medical Responder Certification
- Standard first aid.
- WHIMIS.
- Oil spill containment and recovery.
- Marine Radio License.
- Class ACZ Drivers License with air endorsement.
- Provincial Travel Counselors Certificate issued by Tourism Nanaimo.
- Certified foster parent.
- Community Emergency Management Coordinator Designation (Ontario)

References: Available on request.

## EDUCATION & CERTIFICATIONS

**Chartered Professional Accountant** | CPA Canada

**Master of Business Administration** | BROCK UNIVERSITY

**First Class Honours Bachelor of Business Administration** | BROCK UNIVERSITY

**Honours Diploma of Business Accounting** | MOHAWK COLLEGE

## PROFESSIONAL EXPERIENCE

### ENGMAN GROUP OF COMPANIES

2018 to Present

#### **Chief Financial Officer**

- Managed all day-to-day operations and strategic decisioning for a group of 7 companies encompassing a range of industries including service, retail, wholesale, manufacturing, real estate holdings and hospitality.
- Coordinated and prepared all financial reports for the purposes of; presentation to the CEO and all other internal and external stakeholders, audit response, and departmental reviews. Prepared all budgets and financial forecasts, managed cashflow, and negotiated procurement of raw materials, inventory and commercial leases.
- Redesigned interdepartmental operations to ensure adequate internal controls as they pertain to procurement, budget adherence, fraud and theft prevention and reporting consistency.
- Assisted HR manager in the redesign of existing organizational chart as well as the establishment and negotiation of employee contracts and interpreting severance policy, where applicable. Further participation in programs for employee wellness, retention efforts, team building activities, and implemented a fully amended incentive plan for external sales team in order to appropriate commissions and bonuses to build towards broader organizational goals.
- Assisted COO in Occupational Health and Safety Standards adherence, participating in Ministry reviews and coordination of a master binder with all relevant information.
- Participated in a variety of relevant formal and informal committees including; cultural awareness training (Indigenous), employee compensation and benefits, large event coordination, and external contract negotiation (waste management, wastewater charges, fixed asset sales, request for proposal response for multi-year service contracts, banking and insurance service relationships, shareholder disputes).

### ROYAL BANK OF CANADA

2016 to 2018

#### **Commercial Account Manager**

- Managed a portfolio of 110 unique commercial clients, encompassing a diverse range of industries within the Muskoka area including; investment properties, manufacturing, retail, business services, and wholesale/distribution.
- Worked with clients to identify how the Bank can best support sustainable growth with the goal of becoming a trusted advisor by providing valuable insight to decision makers and senior leadership teams.
- Completed routine Risk Analysis for each client while adhering to the Bank's compliance procedures in order to minimize the probability of losses in default scenarios.
- Worked independently in a satellite location maintaining a strong partnership with geographically diverse colleagues in retail banking, wealth management, equipment financing specialists, treasury management and derivative asset partners.

**Senior Manager, Aboriginal Financial Services**

- Managed a national portfolio of Commercial Indigenous clients, providing advice to regional directors and account managers regarding cultural awareness as well as structuring credit deals working within the limitations of securitization resulting from the land provisions of the Indian Act.
- Assisted the VP in managing the departmental budget, weighing the effectiveness of our corporate social responsibility budget and prioritizing events and causes that maximized impact and were mutually beneficial to the Bank and the Indigenous community.
- Participated in numerous conferences representing the Bank, listening to the challenges experienced in communities across Canada and relaying the information back to the Bank in an effort to update bank policies and work together with our clients to overcome these challenges.
- Attended a series of Ken Blanchard courses focused on leadership development covering topics included but not limited to; problem solving and decision making skills, critical thinking, conflict resolution, strategic networking and negotiating, effective communication, effective team leadership and strategic prioritization.

**Senior Manager, Commercial Banking**

- Carefully conducted financial and industrial risk analysis for prospective and existing customers, with consideration and adherence to the Bank's internal risk policies and procedures through a sufficient level of due diligence with a high level of attention to detail.
- Managed a 150 million dollar portfolio encompassing diverse industrial and geographical environments which demanded an intensive level of research in local and global markets in order to fully understand the specific needs of the client and develop programming to fit their existing and future requirements.
- Planned, researched and communicated comprehensive credit analysis reports, effectively conveying all pertinent information and making recommendations using sound, rationalized judgment allowing the adjudication team to confidently support the credit recommendation.
- Analyzed client-prepared forecasts to test for feasibility and/or using historical financial data and industrial trends to generate forecasts and conduct sensitivity analysis.

**COMMUNITY LEADERSHIP EXPERIENCE****Treasurer**

ESSA AGRICULTURAL SOCIETY

- Completed a one-year contract for the Treasurer position on the Board of Directors. During my term, I also helped the office staff to develop monthly reporting procedures as well as the preparation of year-end reporting for delivery to the auditor.

**Director, Social Engagement and Membership, Scotiabank Young Professionals**

SCOTIABANK

- Managed a membership base of over 100 members across 23 branches. Drafted and delivered all communication regarding upcoming events and current community initiatives using all digital mediums including leveraging Social Media to publicize event results thereby increasing the positive image of the Bank of Nova Scotia in the community.

**Not-For-Profit Housing – Volunteer**

JAYCEE NOT-FOR-PROFIT HOUSING

- Assisted the property manager to develop, implement and transition to a new filing system, digitizing all information regarding property improvements and rental arrears for easy future accessibility.

**COMPUTER AND SOFTWARE SKILLS**

- Advanced skills in MS Office - Word, Excel, PowerPoint, Outlook and Access
- Advanced skills in Accounting software – Quickbooks, Simply Accounting, AccPac
- Sales Management – Salesforce.com and other various internally designed sales management software
- ERP software – EKOS, SmartVendor, and other various software systems with automatic and manual communication to our primary ERP

**REFERENCES**

- Available upon request



**TO:** Chair Wilbert Marshall, and Members of the AFNWA Board

**SUBMITTED BY:** original signed by  
Chief Terry Paul, Chair, AFNWA Audit and Finance Committee

**DATE:** [March 25, 2021]

**SUBJECT:** **Revised 2021-2022 AFNWA Operations Budget**

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### **ORIGIN**

Transition Implementation Plan, approved at the board meeting of June 24, 2020; Approval of 2021-2022 AFNWA Operations Budget at the board meeting held on November 26, 2020. AFNWA Audit and Finance Committee approval at the meeting held on March 24, 2021.

### **RECOMMENDATION**

It is recommended that the AFNWA Board of Directors approve the budget as contained in the report.

### **BACKGROUND**

The Transition Implementation Plan passed by the AFNWA Board of Directors on June 24, 2020, identifies activities over two fiscal years 2020-2021 and 2021-2022. Representatives from ISC have indicated that \$3,000,000.00 has been earmarked for AFNWA for the 2021-2022 fiscal year. This will be in addition to the \$1,700,000.00 to carry forward from 2020-2021 funding. With this information, management are presenting a revised budget to match the funding available. The budget below identifies the expenditures anticipated to complete the deliverables identified within the TIP in the 2021-2022 fiscal year.

**DISCUSSION**

**AFNWA Operations Budget 2021-2022**

<b>Operations</b>	
Communication/ Public Relation / Sponsorship	\$225,000.00
Office Lease	\$100,000.00
Cleaning and janitorial services	\$20,000.00
Electricity	\$35,000.00
Heating	\$30,000.00
Telephone/ cellular phone/ Internet	\$30,000.00
Advertising	\$25,000.00
Website Maintenance	\$25,000.00
Bank charges and interest	\$15,000.00
Office supplies and postage	\$30,000.00
Hardware	\$25,000.00
APC Corporate Services	\$150,000.00
Engineering Dept Software/Hardware	\$10,000.00
Training and Employee Development	\$100,000.00
<b>Insurance</b>	
Liability [Director's/Officer's/General]	\$50,000
<b>Professional Services</b>	
Audit	\$15,000
Accounting Services Consulting (Admin)	\$50,000
Legal	\$95,000
<b>Contracts</b>	
IT	\$90,000.00
Asset Management	\$150,000.00
Governance Consultant	\$150,000.00
Land Tenure Counsel	\$220,000.00
Project Management	\$50,000.00
Operations Consultant	\$75,000.00
Regulatory Contract	\$50,000.00
Change Management	\$50,000.00
Enterprise Risk Assessment	\$75,000.00
Financial Model Development	\$75,000.00
<b>Operations/Insurance/Professional Service/Contracts Total</b>	<b>\$2,015,000.00</b>

<b>Payroll Q1</b>	
CEO	\$170,000.00
Interim COO	\$100,000.00

Manager of Engineering	\$130,000.00
Manager of Communication	\$93,000.00
Manager of Corporate Services	\$125,000.00
Manager of Operations	\$115,000.00
Superintendent Operations	\$97,644.00
Superintendent Technical Services	\$97,644.00
Human Resource Coordinator	\$77,498.00
Asset Management Technologist	\$65,000.00
Administrative Assistant	\$58,000.00
Administrative Assistant	\$57,000.00
<b>Payroll Q2</b>	
Operations Engineer	\$64,807.50
Capital Projects Engineer	\$73,233.00
Controller	\$64,807.50
Administrative Assistant	\$46,772.25
<b>Payroll Q3</b>	
Administrative Assistant	\$31,181.50
Regulatory Compliance Coordinator	\$38,749.00
IT Coordinator	\$38,749.00
Safety Coordinator	\$34,752.50
<b>Payroll Q4</b>	
Accounting Clerk	\$17,376.25
Administrative Assistant	\$15,590.75
<b>15% Benefits</b>	
15% Benefits	\$233,951.48
<b>2% Performance Bonus [Senior Managers]</b>	
2% Performance Bonus [Senior Managers]	\$11,260.00
<b>Overtime AA</b>	
Overtime AA	\$20,854.45
<b>Overtime for Capital Projects Engineer</b>	
Overtime for Capital Projects Engineer	\$6,911.65
<b>Payroll Total</b>	<b>\$2,391,901.08</b>

<b>AFNWA Chief and Operator Meeting</b>	
Room booking & Catering	\$12,000.00
Meeting Materials	\$4,000.00
Travel	\$15,419.05

<b>Asset Management Workshop</b>	
Room booking & Catering	\$10,000.00
Meeting Materials	\$3,000.00
Travel	\$7,410.60

<b>Lands Workshop</b>	
Roombooking & Catering	\$12,000.00

<b>Meeting Materials</b>	\$4,000.00
<b>Travel</b>	\$15,831.30

<b>Asset Transfer Workshop</b>	
<b>Roombooking &amp; Catering</b>	\$10,000.00
<b>Meeting Materials</b>	\$3,000.00
<b>Travel</b>	\$8,750.20

<b>AFNWA Operator Working Group</b>	
<b>Travel</b>	\$3,130.55
<b>Meeting Costs</b>	\$650.00
<b>Total</b>	\$3,780.55
<b>Total - 4 Meetings</b>	\$15,122.20

<b>AFNWA Staff Travel</b>	
<b>Halifax-AFNWA Communities</b>	\$59,284.80

<b>Board Cost</b>	
<b>Board Cost</b>	\$116,017.20

<b>TOTAL</b>	<b>\$4,702,736.43</b>
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The budget above is broken down into several subsections. The major additions to this year's budget are:

- There are additional funds for software and hardware for AFNWA Staff.
- There is a significant amount identified for staff training and development.
- APC corporate services contract has been reduced to reflect that the AFNWA will handling more administrative responsibilities directly. This contract will reduce in value over time as services from APC are no longer required.
- There will be additional contracts, as identified in the TIP. They are:
  - Change Management
  - Enterprise Risk Management
  - Financial Model Development
- Governance consultant amount has increased to reflect amount required for transfer agreement drafting and negotiation.
- The AFNWA will be hiring additional staff to prepare for transfer in 2022. Each position underwent a formal job evaluation using the HAY Methodology to determine salary. The salary ask has been prorated to reflect which quarter individuals will be hired. Some salaries differ from what was presented in November 2020 to reflect accepted offers.

- Based on the Ontario Clean Water Agency peer review, an additional position has been added, Regulatory Compliance Coordinator. This position is assessed to be at a similar salary range as the IT coordinator, which is \$61,998.00-\$77,498.00.
- Community Travel amount has been doubled to reflect increased engagement with Chiefs and Councils, operators, and communities as we transition to full operations.
- Board cost was reduced to reflect the amount identified in the approved Board Compensation Policy. The costs include in-person board, committee, and elders advisory committee meetings.
- The difference between the budget presented in this report and that which was presented in November 2020 is \$36,767.54. Please note, this difference does not include the proposed contingencies outlined in the November 2020 budget, which were:

<b>Travel Contingency Chiefs and Operators</b>	\$50,689.60
<b>Contract services (Consulting - Engineering)</b>	\$50,000
<b>Contract Contingency</b>	\$75,000.00



**ITEM # 4**  
**AFNWA Board**  
**31 March 2021**

**BUDGET IMPLICATIONS**

The budget presented reflects the \$3,000,000.00 earmarked by ISC for the 2021/22 fiscal year and \$1,700,000.00 in carry over funds from the 2020-2021 fiscal year.

**ALTERNATIVES**

None.

Report Prepared by: original signed by  
James MacKinnon, Interim Chief Operating Officer, (902)-435-8021

Financial Reviewed by: original signed by  
Carl Yates, Interim Chief Executive Officer, (902)-435-8021



**TO:** Chair Wilbert Marshall, and Members of the AFNWA Board

**SUBMITTED BY:** original signed by  
Carl Yates, M.A. Sc, P.Eng., interim Chief Executive Officer

**DATE:** [March 23, 2021]

**SUBJECT:** **Revised AFNWA Business Case**

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### Regular Item

#### ORIGIN

AFNWA Board approval of Business Case at meeting of July 22, 2019 and Transition Implementation Plan approved by Board at meeting of June 24, 2020.

#### RECOMMENDATION

It is recommended that the AFNWA Board of Directors approve the revised Business Case attached as Attachment A

#### BACKGROUND

The Transition Implementation Plan [TIP] passed by the AFNWA Board of Directors on June 24, 2020, identifies activities over two fiscal years 2020-2021 and 2021-2022. A key milestone for the 2020/21 fiscal year was the completion of a peer review of the Business Case by the Ontario Clean Water Agency [OCWA] with funding for the review provided by Indigenous Services Canada [ISC]. In recognition that the original Business Case included information derived from the 2018 CBCL asset condition report, ISC requested that we include subsequent capital investments to bring the numbers up to date. AFNWA hired CBCL to assist in this exercise to ensure the most accurate information was delivered to Colliers to revise the Business Case.

#### DISCUSSION

With respect to the peer review, we are pleased to report that OCWA concluded that the Business Case was sound and provided an overwhelming endorsement of the progress to date and future direction. Below is the Executive Summary of the OCWA report which contains insights and recommendations that have been incorporated into the revised version of the Business Case, attached as Attachment A. The main recommendation from the review is for AFNWA to strengthen its regulatory compliance and reporting function within the Operations Department. The revised 2021/22 Operations Budget to be presented at the March 31, 2021 meeting contains funds for the hiring of a regulatory compliance coordinator to fulfill this deficiency.

## Executive Summary from OCWA Peer Review

The *Atlantic First Nations Water Authority Business Case* provides a convincing and compelling rationale for the Authority to deliver water and wastewater services through a regional hub and spoke model. Our peer review corroborates the service delivery methodology, model, and plan. Clearly well researched and well written, the AFNWA Business Case encompasses and reflects:

- Milestones that are appropriately sequential and reasonably timed
- Intertwining of organizational structures and services that validate the hub configurations.
- Scalability for future growth and structure to support a regulatory framework.
- Extensive and inclusive communication keeping all stakeholders informed.
- Reasonable financial predictions that align with operating requirements

OCWA's recommendations are limited to:

- The applicable regulatory framework requires further development and may increase program costs.
- Compliance and Training staff are needed to ensure quality control and continuous improvement.
- The error in Table 16 regarding costs associated with the Integrated Resource Plan and initial startup costs will need to be corrected in the final version of the Business Case. The costs could be reallocated to a one-time cost or amortized.

We have provided a snapshot table below that points to key elements of the Business Case and our accompanying remarks and recommendations where warranted.

OCWA FEEDBACK AND RECOMMENDATIONS		
Business Case Section	AFNWA Core Concept	OCWA Feedback
1. Business Needs and Desired Outcomes	Ownership and responsibility be transferred to AFNWA with core funding from Government of Canada	Concerns, issues and opportunities are fully addressed
2. Current State	Confirms participation of communities and notes regulations will be developed	The establishment of a regulatory framework will be critical to the success and sustainability of the Authority
3. Environmental Analysis	AFNWA will operate in Regional Hubs	Best model chosen
4. Analysis and Recommendations	Full-Service Decentralized is preferred approach	Agree with this approach

OCWA FEEDBACK AND RECOMMENDATIONS		
Business Case Section	AFNWA Core Concept	OCWA Feedback
5. Project Opportunity and Description	Consistent and high-quality service can be provided under the FSD	Agree with this approach
6. Financial Analysis	Model is financially feasible and sustainable	Financial numbers align with the assumptions listed in the Business Case and other variables as realized through the course of our review
7. Management Strategy	Governance and organizational structure for long-term success, scalability and flexibility Regulatory Oversight Asset Management	<ul style="list-style-type: none"> <li>• Hub and spoke model are sound and we agree that the proposed groupings are suitable.</li> <li>• Recommend 2 additional compliance positions.</li> <li>• Recommend more robust compliance and training program.</li> <li>• Correct approach to asset management</li> </ul>
8. Implementation Strategy and Transition Period Implementation Plan	Staged approach, contingent upon funding with layers of approval and continuous communication Transition plan to be finalized after senior management hired	Sound timelines with well-thought-out process of execution and constant communication

In addition to incorporating the peer review by OCWA, the revised Business also revised the order of magnitude costs for future capital investments. Since the completion of the CBCL condition assessment report, it is clear that ISC has made significant investments in water treatment and the revised business case captures these upgrades. There is however a significant need for investments in wastewater treatment, wastewater collection systems and water distribution systems. The current Asset Management Plan/Ten Year Capital Budget being developed through Dillon Engineering is expected to further delineate these concerns to ensure they are well documented for future funding.

There were other errors that were corrected from the previous version of the Business Case including the correct funding and schedule for the development of an Integrated Resources Plan [IRP]. An IRP is proposed to be developed after three full years of operations at an initial cost of \$3,000,000 and updated every five years after wards at a cost of approximately \$1,000,000. The IRP will document required capital and program investments for a 25-to-30-year period within the strategic areas of asset renewal, regulatory compliance and facilitation of growth.

With these modifications noted above, management is requesting approval of the revised Business Case which will be submitted to federal government agencies for their review and endorsement.

**ALTERNATIVES**

There are none recommended.

**ATTACHMENT**

Attachment A – Business Case for Atlantic First Nations Water Authority, dated March 12, 2021.

Report Prepared by	original signed by
	_____
	Carl Yates, Interim Chief Executive Officer, (902)-435-8021
Financial Reviewed by	original signed by
	_____
	James MacKinnon, Interim Chief Operating Officer, (902)-435-8021

# Atlantic FIRST NATIONS Clean Water Authority



## Atlantic First Nations Water Authority Business Case



### PREPARED BY:

Colliers Project Leaders

1559 Brunswick Street, Suite 501, Halifax,  
NS, Canada B3J 2G1



### PREPARED FOR:

Atlantic First Nations Water Authority

153 Willowdale Drive  
Dartmouth NS B2V 0A5

March 12, 2021

Doc #: 880339-0013 (18.0)

## Acknowledgements

### **Atlantic First Nations Water Authority**

#### **Participating Atlantic First Nations communities**

#### **Atlantic Policy Congress of First Nations Secretariat**

John Paul, Executive Director

Michael Brophy, Policy Analyst

#### **Atlantic First Nations Water Authority**

James MacKinnon, Chief Operating Officer

Carl Yates, Interim Chief Executive Officer

#### **Indigenous Services Canada**

Rosemary Glynn-Conrad, Director, Community Infrastructure

Nelson Ferguson, Acting Manager

Carey Hill, Senior Policy Analyst

Nick Sanders, Senior Policy Analyst

Roxanne Gravelle, Manager

Brock Dumville, Manager

Bill Martin, Manager

Adam Larkin, Manager

Len O'Neill, Regional Environmental Health Officer

#### **Halifax Water**

Jamie Hannam, Director Engineering and Information Services

#### **Accelerator Inc.**

Rod Burger, President

#### **Colliers Project Leaders**

Ralf Nielsen, Managing Director

Simon Daniels, Principal

Scott Pickles, Senior Manager

Austin Cerkow, Senior Manager

Roddy Bolivar, Senior Advisor

# Executive Summary

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## Background

Access to safe drinking water and wastewater services are vital to the health of all Canadians. Local authorities are typically responsible to provide these services in many different circumstances and situations, whether they are a municipality or delivered through a private system. Their ability to maintain the quality of drinking water, treat wastewater and meet regulatory standards is often hampered by their ability to maintain the physical infrastructure associated with these systems. As systems deteriorate or fall into disrepair local authorities are faced with significant points of stress in their organizations as they strive to meet increasing demands which if not resolved will put many Canadians at risk.

The situation is similar for many communities in Atlantic Canada. Within the Atlantic region, many First Nations communities are individually responsible to operate their own water and wastewater services which are further complicated due to the lack of financial and organizational capacity and unique challenges as such as their remote locations. While Government of Canada funding is provided to First Nation communities and administered locally by each Atlantic First Nation, community systems often lack the certified expertise to ensure water and wastewater assets are operating in a good condition and meeting regulatory standards. As a result, the risk of equipment and process failures increase which in turn leads to drinking water advisories, and the need for residents to boil water before consuming. The Government of Canada has recognized the need to improve the quality, and safety of water and wastewater services to Canadians, and has recognized the need to introduce regulations, modernize institutions and provide funding for critical infrastructure to support First Nations vision of self-determination.

## Objectives

Despite the ongoing struggle for Atlantic First Nations to deliver safe drinking water and wastewater services, the pursuit to deliver safe services has strengthened existing partnerships and led to the formation of new opportunities. Working with the Government of Canada, specifically Indigenous Services Canada, First Nation communities have established the Atlantic First Nations Water Authority (AFNWA) as a crucial element in their desires towards self-determination and as a true nation-to-nation solution to water issues facing their communities. Incorporated on July 18, 2018 as a non-profit organization under the Canada Not-for-profit Corporations Act, the AFNWA is a groundbreaking First Nation owned organization that will provide water and wastewater utility services to Atlantic First Nations. This AFNWA business case has been developed to:

- Consolidate and validate the work carried out over the last 10 years by Atlantic First Nations to establish the AFNWA.
- Secure responsibility and authority from the Government of Canada for the delivery of water and wastewater services to participating Atlantic First Nations communities
- Facilitate the transfer of water and wastewater delivery for participating Atlantic First Nation communities
- Obtain Federal commitment for long-term funding of operational and capital project delivery in relation to the transfer of authorities and responsibilities to the AFNWA

- Establish a commitment by the Government of Canada to support the AFNWA throughout its ongoing operations.

Achieving these outcomes will assist the AFNWA to establish a culturally appropriate, service oriented and technically strong First Nations water authority which will own, operate, and maintain water and wastewater facilities on their reserves.

Establishing the AFNWA provides an important precedent for First Nations communities across Canada, and the Government of Canada as they consider self-governance, self-determination and contemplate coordinated service delivery opportunities across multiple sectors. The AFNWA business case will further support the Government of Canada's required policy approvals and establishing of necessary funding agreements. Using a scalable delivery model, the AFNWA governing structure shows promise for a model which can be utilized by First Nations in communities across Canada.

### **Current Situation**

As of 2020, fifteen (15) First Nations communities have confirmed their commitment to the AFNWA by signing Band Council Resolutions (BCRs) indicating their desire to formally participate. Their support has ensured that the AFNWA will become the overarching governance and management body to specifically address the problems associated with water and wastewater services being provided to Atlantic First Nation communities. These communities, located within Nova Scotia, New Brunswick and Prince Edward Island represent 61% of the total Atlantic First Nations by population. An additional seven (7) Atlantic First Nations communities have declared their interest, with others in the region being potential future candidates.

### **Business Model Options**

The Atlantic Policy Congress, with the careful consideration by the Atlantic First Nations communities developed four potential business models which could achieve the AFNWA's purpose, mission, and desired structure to deliver water and wastewater services to communities:

- Full Service Centralized (FSC)
- Full Service De-centralized (FSD)
- Full Outsource (FOS)
- Technical Services Support (TSS)

Each of the identified options provide varying levels of service and benefits to communities that are served by the AFNWA, as well as their ability to address the following considerations:

- Support long-term self-governance goals
- Build capacity in water and wastewater operations
- Achieve financial independence
- Deliver the required level of service
- Address risk management requirements
- Integrate culture and tradition considerations and aspirations to achieve self-determination and governance

The four business models are summarized below (in addition to the current state).

Table 1 Non-Financial Evaluation Summary

Non-Financial Key Success Factors	(FSC)	(FSD)	(FOS)	(TSS)	Current State
<b>Safe Drinking Water &amp; Wastewater Treatment</b>					
Meet regulatory standards	✓	✓	✓	✓	
Manages or transfers service delivery risk	✓	✓	✓	✓	
Provides a direct accountability for quality of services to AFNWA organization and communities	✓	✓		✓	
Optimizes response time for issues and actions		✓			
<b>Self-Governance</b>					
Enables self-governance	✓	✓			
Focuses and fosters relationships and connections with local communities	✓	✓			✓
Creates efficiency in operations	✓	✓		✓	
Provides coordination & consistency across communities	✓	✓	✓		
Responsiveness to operations, engineering, corporate services, and communications and public relations		✓	✓		
<b>Cultural and Spiritual</b>					
AFN cultural and spiritual aspects can influence service delivery	✓	✓			✓
<b>Financial Independence</b>					
Establishes operational knowledge and expertise close to communities	✓	✓			✓
Creates FN asset equity and ownership	✓	✓			
<b>Economic Development</b>					
Stimulates economic development	✓	✓			
Creates FN employment, staffing, career development and mentorship	✓	✓		✓	
<b>Model for First Nations</b>					
Creates precedent for First Nations communities across Canada	✓	✓			
		<b>Preferred Option</b>			

### Full-Service Decentralized

Based on the options analysis conducted as part of the AFNWA business case, the Full Service Decentralized (FSD) corporate structure has been recommended by Atlantic First Nations communities, the Chiefs, and their Band Councils. The FSD governing model has been identified as being able the most aligned to their cultural and spiritual considerations and having the potential to provide the highest level of service and direct benefits to the communities served. The analysis in this business case independently supports their conclusion that an FSD structure represents the option which best meets the non-financial evaluation criteria.

## Governance Model

Embodied in the FSD model is the ability to establish a technically strong First Nations owned and operated organization with the capability to manage and operate their own water and wastewater facilities, and to deliver capital projects over the long term. The AFNWA will be 100% owned by Atlantic First Nations and governed by a geographically represented Board of Directors, the majority of whom will be First Nations. The Board of Directors for the AFNWA will consist of up to 15 members with 12 representatives from First Nation communities and 3 technical experts. The Board of Directors will also receive guidance from a permanent Elders Advisory Committee. While the number of directors is larger than is typical for municipal boards of similar populations, this number reflects the complexity and geography associated with the diverse number of communities participating in the AFNWA. It is also representative of the oversight associated with the magnitude of the capital and operating funding request. The AFNWA Directors are elected by the owners, which are the communities. A Board of Directors is the senior level of management required by law to oversee the operations of the AFNWA. A formal corporate governance manual was approved by the AFNWA on November 6, 2020.

## Operating Model

The proposed AFNWA operational model recommends an appropriately sized management and operational baseline to deliver the required services to communities with the flexibility to scale-up to accommodate communities who wish to join later. The proposed AFNWA corporate structure is a radical departure from the status quo which strengthens Atlantic First Nation communities desire for self-determination while provide the ability to build a sustainable approach without dependence on federal agencies. This approach will not go where others have tread but instead blaze a trail for others to follow.

Once operational, the AFNWA will adopt and adapt to best practices to ensure an efficient and effective approach to service delivery with leadership from a commence into a full management structure led by a management team experienced in the operation of water and wastewater systems. Led by a qualified Chief Executive Officer (CEO), the management team will be responsible to coordinate qualified water and wastewater employees to deliver on AFNWA’s mission. Four departments will be established within the utility with the following key responsibilities:

*Table 2: Key AFNWA Departmental Responsibilities*

Department	Responsibilities
Corporate Services	Provides a series of administrative or back office services that support the efficient operation of the Water Authority. These activities include finance, accounting, procurement, human resources, information technology, and customer care. The department would be led by the Manager of Corporate Services.
Communications and Outreach	Provides a series of activities that communicate and promote Water Authority services, projects and activities to stakeholders including customers, First Nations leadership (i.e. Chiefs and Elders), regulatory agencies, federal government, the general public and the media. The overall responsibility for this department would rest with the Manager of Communication and Outreach.
Operations	Provides the core activities to operate and maintain the water and wastewater infrastructure. In the proposed hub and spoke model, Operators would be located in the local community and report to the hub supervisor who in turn reports to the Superintendent of Operations, located in the corporate head office. To ensure an effective and efficient operation that engages digital technology, a technical services division would also support operations with a technical superintendent directing technologists with skills in industrial control

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	systems and instrumentation. To ensure compliance with water and wastewater regulations, a Supervisor of Compliance will be an integral part of the Operations team. The overall responsibility for this department would be assigned to the Manager of Operations.
Engineering	Provides a series of technical services that support the short term and long-term management of the water and wastewater system assets. These activities include asset management (inventory, condition assessment and long-term planning), capital project delivery (design and construction management) and master planning for development and growth. The department would be led by the Manager of Engineering.

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### Hub and Spoke

To ensure participating Atlantic First Nations communities receive the level of service required to meet the water authorities' objectives, the AFNWA operations will be structured as an FSD 'hub and spoke' model. Under this organizational design, service delivery is arranged into a network of several geographic hubs which offer an array of services to the communities (spokes).

Under the FSD model, it is proposed that local community operations staff be organized around the following geographic areas (with the number of assigned communities)<sup>1</sup>.

- Cape Breton (Eskasoni, Potlotek, Membertou)
- Prince Edward Island (Lennox Island, Abegweit)
- New Brunswick West (Oromocto, Tobique)
- New Brunswick East (Eel River Bar, Elsipogtog)
- Nova Scotia East (Millbrook, Sipekne'katik, Paqtnkek, Pictou Landing)
- Nova Scotia West (Acadia, Glooscap)

The hub and spoke model accommodate varying circumstances such as growing or declining populations or changing (geographic) groupings of participating communities as further BCR's are finalized. Additionally, the hub and spoke will allow the AFNWA to recognize First Nations traditional territory and Atlantic Canada's geographic challenges by optimizing service delivery with communities being no more than a 2.5-hour drive away from a service hub. Locating hubs within the communities will further allow the AFNWA to position expertise and operational knowledge close to water and wastewater systems while providing support from the main office and regional hubs.

Structuring the AFNWA under the FSD model will further allow for the most effective and efficient operation coupled with the best opportunity to establish relationships with the communities. This relationship is important to ensure traditional knowledge and values are integrated into how the water utility operates and to educate communities on long term sustainability.

### Scalability

Choosing a hub and spoke model provides the AFNWA with a highly scalable and efficient design which can accommodate the addition or subtraction of satellite communities. While the current model has been developed to accommodate the fifteen (15) participating Atlantic First Nation communities, AFNWA can

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<sup>1</sup> Halifax Water and Accelerator Inc. "Corporate Structuring for Atlantic First Nations Water Authority." August, 2017. P.23

expand to accommodate the remaining Atlantic First Nations communities who have yet to sign BCRs. This expansion from the current fifteen (15), to thirty-three (33) can be completed with minimal impacts to its operating costs.

The current staffing levels identified to service fifteen (15) communities reflect an important baseline for the five departments to fully service the Atlantic First Nations communities. With this foundation AFNWA does not anticipate having a significant operational impact as new communities join (see Table 3). Operating projections for the potential twenty-two (22) communities have been informed through various studies while the projection for a full AFNWA compliment of thirty-three (33) communities reflects an estimate that has been undertaken without a condition assessment of assets associated with these additional communities. As additional investigation and detail information it is anticipated the minor modifications may be required.

*Table 3 FSD Full Time Equivalent Requirements to Accommodate Future Community Interest*

AFNWA Department	15 Communities	22 Communities	33 Communities
CEO Office	2	2	2
Corporate Services	8	8	8
Communications	2	3	3
Operations <sup>2</sup>	20	22	28
Engineering	5	5	5
<b>Total</b>	<b>37</b>	<b>40</b>	<b>46</b>

### Financial Analysis

To support the review of potential AFNWA business operating models, a financial analysis was conducted to further confirm the AFNWA and Government of Canada financial objectives. Conducted in 2018<sup>3</sup> to compare the individual operating models, this financial analysis was updated between 2019 and 2021 to determine the operating, maintenance and capital investments required to establish a financially independent AFNWA (see Section 6). The following table compares the current state of the fifteen (15) communities with the proposed FSD delivery model in 2017 dollars.

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<sup>2</sup> This includes a Supervisor of Compliance as recommended in the OCWA Report review and is also included in the financial model.

<sup>3</sup> Halifax Water and Accelerator Inc. "Corporate Structuring for Atlantic First Nations Water Authority." 2017 Appendix J.

Table 4 Comparison of operating expenses (typical year)

Operating Expenses	Full Service-Decentralized	Current State
<b>AFNWA Structure</b>		
Administration <sup>4</sup>	\$ 1,096,915	\$
Corporate Services Department	\$ 823,918	\$
Communications Department	\$ 270,630	\$
Operations Department	\$ 1,830,074	\$
Engineering Department	\$ 517,204	\$
<b>Corporate Structure (Operating) Sub Total</b>	<b>\$ 4,538,741</b>	<b>\$ 4,012,206</b>
<b>AFNWA Board Costs</b>		
Community Systems O&M plus MTA Costs	\$ 3,200,000	\$ 3,200,000
Testing Program	\$ 3,000,000	\$ 3,000,000
<b>Operating Total</b>	<b>\$ 10,988,741</b>	<b>\$ 10,462,206</b>

Note 1) Current State financials have been extracted from the Ulnooweg Financial Analysis for the participating 15 communities

Note 2) Ongoing operating costs have been assumed which does not include the \$1.5M one-time startup costs

Note 3) Board and other costs identified in the lower section of the table would not fully apply to current state but have been applied to provide a comparison

As identified in Table 4, the proposed AFNWA FSD operating expenditure is similar to the current state and does not provide enough variance to identify a preferred solution on financial grounds alone. The cost of providing the staff structure is different for each option however this is principally influenced by whether staff costs are outsourced to an external provider (where there would be a corresponding operational cost) or employed in house.

### Operating costs per household

The operating cost per household for the provision of water and wastewater services compared to the current state of funding is provided in Table 5.

Table 5 Cost per household of current state versus AFNWA

Participating Communities	Operating Cost (\$) Per Household
Current State (15 communities)	\$ 907
Adjusted Current state (15 communities)	\$ 2,364
AFNWA (15 communities)	\$ 2,497

Current state costs for 2017 as compiled by Ulnooweg First Nation do not include the corporate structure costs which includes corporate services, communications and public relations, operations and engineering. It is also anticipated that ongoing operating costs will be required to support AFNWA board costs, community-based operations and maintenance costs, MTA costs and testing programs. If these costs are applied to the Ulnooweg costs to give a basis of comparison this results in a **\$2,364** cost per

<sup>4</sup> Identifies corporate costs including but not limited to salaries and benefits, contract services, training and development, office lease, cleaning and janitorial, utilities, insurance, telephones, vehicles and vehicles expenses, advertising, professional services and property taxes.

household. This cost per household is comparable with the AFNWA Business Case projected costs of **\$2,497**.

### Capital cost projections

An important scope of work for the AFNWA to address is the capital investment required to improve and replace water treatment, water distribution, wastewater treatment, and water collection systems to ensure assets are capable of meeting regulatory standards. Identifying these investments will ensure facilities are brought up to a compliant regulatory standard based upon the condition assessments prepared by CBCL and cost information drawn from previous reports and financial projections. A projected 25-year (2022-2046) cash flow which has incorporated inflation has been developed for participating Atlantic First Nations communities with BCRs. Incorporating these factors ensure proper financial projections are integrated within the model (see section 6.3 Financial Analysis) and ensure alignment to anticipated financial needs. Capital cost projections are summarized in Table 6.

*Table 6 Capital cost projections*

	Total Years 1-10 (2022/23 – 2031/32)	Total Years 11-25 (2032/33 – 2046/47)
Annual Asset Renewal	\$59,269,745	\$112,174,264
Capital expenses - water upgrades	\$8,170,939	\$462,181
Capital expenses – wastewater upgrades	\$39,027,635	\$4,786,646
<b>Total Capital Expenditure</b>	<b>\$106,468,319</b>	<b>\$117,423,091</b>

The costs identified in Table 6 are only an assessment of expected costs based upon the information currently available as of January 2021. The capital requirements will be refined by the senior management team who will develop a 10-year Capital Spending plan informed by an Asset Management Plan and by an Integrated Resource Plan.<sup>5</sup> It is anticipated that additional capital funding will be required in years 11 to 25 to maintain the facilities in good working order and as a such an annual asset renewal funding budget of \$5 million per year (2018 dollars) plus yearly inflation has been incorporated.

### Funding

Atlantic First Nation communities have historically received funding directly from Indigenous Services Canada which was estimated to address 80% of the community’s water and wastewater operation and maintenance costs. With the establishment of the AFNWA, a new funding model will be incorporated which redirects this ISC funding directly to the water authority as opposed to being received by the First Nations communities. Although the remaining 20% has been provided through the First Nations own funding, recent announcements from the federal government indicate a different approach in the future. As announced by Minister Marc Miller on December 2, 2020, ISC will contribute 100% of operation and maintenance costs commencing in the 2020/21 fiscal year.

### Implementation

The AFNWA business case has been prepared to demonstrate the strategic, organizational, and financial viability of the AFNWA and to provide an order of cost for the funding which will be required by the

<sup>5</sup> An Integrated Resource Plan [IRP] for a 25 year period will be developed after three years of full operations and updated every five years, thereafter.

Government of Canada. Having confirmed the viability and order of costs for the water authority, the AFNWA is now prepared to move towards full operations. To ensure the AFNWA is successful in its operations, the following staged approach will be required:

- **Phase 1: Approval & Funding:** is an enabling phase which includes tasks which must be completed to allow the AFNWA to take on additional responsibility in 2020. This includes receiving the approval, interim funding and commitment by Government of Canada (GOC) to provide long-term funding to AFNWA in line with the order of cost identified in this Business Case. This commitment of GOC funding will allow Band Council Resolutions (BCR) to be completed with participating First Nations Band and license agreements established.

As interim funding is received, AFNWA will be able to hire key senior leadership in order to establish the direction and develop detailed operating and capital budgets. Hiring a full complement of staff is not anticipated at this point. Instead, staff will be hired through the transition period as required with a full staff complement in Spring 2022.

- **Phase 2: Operational Funding:** comprises establishing the remaining AFNWA management team and the tasks of these managers will be to develop and adopt a formal training and development program for all staff<sup>6</sup>. Furthermore, senior management will develop human resource and change management strategies that recognize the experience and knowledge of staff currently employed in water and wastewater system operation and take a consistent approach to salaries, benefits, training, and career development.

Additional tasks include confirming regulatory oversight and develop operational planning to identify AFNWA funding requirements. This phase will also be complemented by advancing AFNWA's capital planning by developing an Asset Management Plan and ten-year capital budget. Completion of these plans will allow the AFNWA to understand its assets, determine their existing performance and identify required future investments. Moving from an order of costs, as identified in this business case to a more refined operating and capital costs model will be important for the AFNWA to achieve prior to full operations.

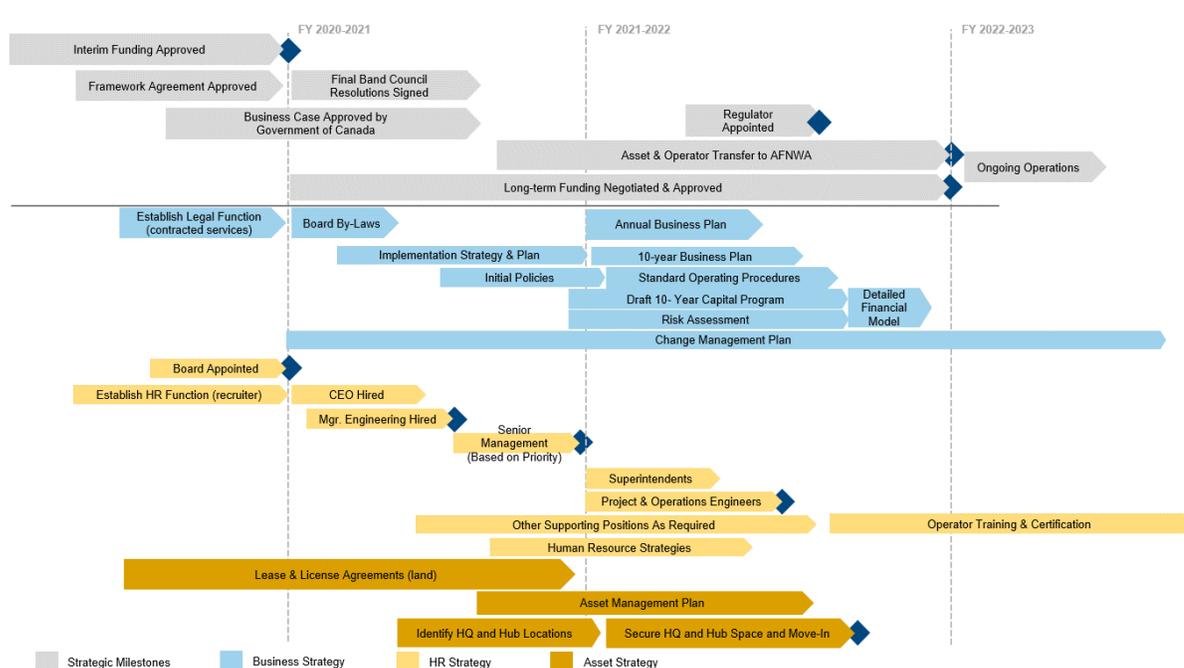
- **Phase 3: AFNWA Funding:** comprises the development of detailed budgets into a comprehensive Funding Model. The funding requirements will be subject to negotiation with ISC with the understanding that the level of funding will be in line with the order of cost identified in the AFNWA business case. As transfer agreements are finalized, AFNWA will commence full autonomous operations.

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<sup>6</sup> The OCWA Report notes that Compliance and Training staff are needed to ensure quality control and continuous improvement. AFNWA accepts this recommendation and will be reflected in the Business Plan. The Business Plan will be developed in 2021 by the Senior Management Team after their recruitment.

The following identifies a high-level schedule for the implementation of the AFNWA.

Figure 1 High-level implementation schedule for the AFNWA



### Desire for Change

There is a strong desire for change among Atlantic First Nations and the Government of Canada. Maintaining the current approach and status quo does not meet the needs or aspirations of the AFNWA or the Government of Canada and perpetuates the issues of the past. This business case recommends that the Government of Canada provide operational and capital funding to allow the AFNWA to establish a full service de-centralized business model and adopt a hub and spoke organizational structure for operations. Providing this long-term funding will allow the AFNWA to become an organization where First Nations own, operate and upgrade their own water and wastewater facilities.

This AFNWA business case validates previously completed business plans, asset condition assessments, and financial analyses. As operations commence, AFNWA will gain a greater understanding of the level of services being provided to Atlantic First Nation communities, the asset condition of water and wastewater systems, and the financial needs required for investment. As such, further refinements in operations and capital budgets should be anticipated.

### Ontario Clean Water Agency (OCWA) Review

ISC commissioned the Ontario Clean Water Agency (OCWA) to review the AFNWA Business Case. On January 12, 2021, OCWA published their *Report to the Atlantic First Nations Water Authority – Review and Recommendations on the Business Case* (OCWA Report). The OCWA report concludes that the Business Case was well researched, logical, coherent, and convincing and is a powerful testament to the viability of the AFNWA objectives and future success.

OCWA’s review included the re-modelling of the proposed Regional hub and spoke approach and compared budgets to ensure the projections aligned with industry best practices and how OCWA

structures and cost similar hub and spoke operations. OCWA endorsed the AFNWA approach and associated budget but identified some anomalies with the costs for the Testing Program, initial start-up, and the Integrated Resource Plan. They noted that these costs should be incorporated as a one-time, periodic, or amortized expense. This has been corrected in this final version of the Business Case. OCWA found very few concerns with the Business Case with recommendations limited to:

- Regulatory framework<sup>7</sup> requires further development and may increase program costs
- Compliance and Training staff<sup>8</sup> are needed to ensure quality control and continuous Improvement

These items were considered by AFNWA during the preparation of the Business Case and will benefit from the input of the AFNWA senior management team which is currently being hired. AFNWA accepts the OCWA recommendations and confirm that these items will be addressed in the Business Plan.

The OCWA Report recognized that there are many aspects that cannot be assumed at this point in the process—namely the detailed asset condition of the facilities. As noted, these aspects will be determined once the asset management plan is completed in 2022. OCWA's Report supports the AFNWA methodology for the Asset Management Plan. AFNWA has commenced work on the Asset Management Plan which will form a key input into the 10-year Capital Spending Plan and Business Plan.

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<sup>7</sup> The OCWA Report notes that the applicable regulatory framework requires further development and may increase program costs. The OCWA Report also notes that the Business Case does not specify which regulatory frameworks the AFNWA will be mandated to meet. This is a work in progress. The regulatory structure and any associated costs to AFNWA will be reflected in the Business Plan. AFNWA have draft regulations for drinking water prepared by Dalhousie University and Environment Canada and Climate Change has confirmed that they are positioned to regulate wastewater. There is a need to identify a Business regulator and this will be progressed and reflected in the Business Plan.

<sup>8</sup> The OCWA Report recommends one additional staff person in the role of Supervisor of Compliance. This has been adjusted in the financial model using the rate for a supervisor. Other additional costs may be reflected in the Business Plan as AFNWA compliance and training plans are developed.

# Table of Contents

Executive Summary .....	3
1 Business Needs and Desired Outcomes.....	16
1.1 Overview and Background .....	16
1.2 The Problem .....	17
1.3 The Opportunity .....	19
1.4 The Evolution.....	22
2 Current State .....	25
2.1 Participating Atlantic First Nation Communities .....	25
2.2 Regulatory Framework .....	27
3 Environmental Analysis .....	29
3.1 Strategic Context .....	29
3.2 Cultural and Spiritual Alignment .....	30
3.3 Precedent Scan .....	32
4 Analysis and Recommendation .....	34
4.1 Preliminary Evaluation Criteria .....	34
4.2 Viable Options .....	35
4.3 Option Analysis & Recommendation .....	36
5 Project Opportunity and Description .....	38
5.1 Project Description .....	38
5.2 Participating Atlantic First Nations Communities with Band Council Resolutions.....	39
6 Financial Analysis .....	40
6.1 Operating and Capital Costs .....	40
6.2 Financial Performance.....	41
6.3 Financial Assumptions.....	45
6.4 Funding Sources .....	50
6.5 Future Financial Needs .....	52
7 Management Strategy .....	53
7.1 Governance Plan .....	53
7.2 Operational Management .....	55
7.3 Asset Management.....	60
8 Implementation Strategy.....	63
8.1 Governance and Oversight.....	63
8.2 Schedule.....	69
8.3 Change Management Strategy.....	70
8.4 Communication and Outreach Strategy .....	70
9 Recommendations.....	72
9.1 Recommendations.....	72
Appendix 1- Participating Atlantic First Nation Communities.....	74
Appendix 2 - Overview of Key AFNWA Engagements .....	75
Appendix 3 – Key First Nation Developments Addressing Water and Wastewater Regulatory Gap .....	85
Appendix 4 – AFNWA Strategic Alignment.....	89
Appendix 5 - Gender-Based Analysis (GBA+) Screening .....	93

Appendix 6 – AFNWA Option Analysis .....	95
Appendix 7 – Financial Summary of Participating Atlantic First Nations Communities with BCRs .....	100
Appendix 8 – Required Capital Expenses by Participating Community .....	101
Appendix 9 – AFNWA Hub and Spoke Modification to Accommodate Future Community Interest .....	102
Appendix 10 - Risk Register.....	104
Appendix 11 – Consultant Reports .....	114
Appendix 12 – Letters of Support .....	115

# 1 Business Needs and Desired Outcomes

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## 1.1 Overview and Background

### 1.1.1 Water and Wastewater Treatment in Canada

Access to safe drinking water and wastewater services are vital to the health of all Canadians.<sup>9</sup> The responsibility to ensure these services are provided typically falls to local means, whether through municipal, private, or natural systems. Consistently the physical infrastructure associated with these services are under an increasing level of stress which by extension is introducing new challenges to the safe provision of these services.

In Atlantic Canada, First Nation communities are individually responsible for operating the water and wastewater services in their communities and ensuring sufficient staff expertise and training. First Nation communities receive funding from the Federal Government of Canada though a lump sum payment which is administered by each First Nation. Capital and large maintenance projects are funded by the Federal Government of Canada on a project-by-project basis.

Canadian cities discharge over 150 billion liters of untreated and undertreated sewage yearly into surface waters<sup>10</sup>. In addition, there are over 900 drinking water advisories daily<sup>11</sup> across Canada which highlights the inability for consumers in those locations to access safe drinking water. While the advisories serve to warn consumers about real or potential health risks related to drinking water, eliminating these risks require constant oversight in operations, and the performance of infrastructure. According to the 2016 Canadian Infrastructure Report Card, \$60 billion of water and \$24 billion of wastewater assets are currently in fair, poor or very poor condition.<sup>12</sup> Small communities present special challenges for operators to maintain regulatory standards. This is due to their remote locations, the availability of certified operators, and the lack of financial capacity to support repairs and renewals. As a result, equipment and process failures increase which in turn leads to drinking water advisories, and the need for residents to boil water before consuming. The Government of Canada has recognized the need to improve the quality, and safety of water and wastewater services to Canadians and has recognized the need to introduce regulations, modernize institutions and provide funding for critical infrastructure to support First Nations vision of self-determination.<sup>13</sup>

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<sup>9</sup> Office of the Auditor General of Canada. "Report of the Commissioner of the Environment and Sustainable Development to the House of Commons: Chapter 5 Drinking Water in First Nation Communities." Minister of Public Works and Government Services Canada, 2005. p.1

<sup>10</sup> Government of Canada. (2017) Wastewater Regulations Overview. Retrieved from Government of Canada: <https://www.canada.ca/en/environment-climate-change/services/wastewater/regulations.html>

<sup>11</sup> WaterToday.ca. (2018) Advisory Wrap Up. Retrieved from WaterToday.ca: <http://www.watertoday.ca/index.asp>

<sup>12</sup> Canadian Construction Association, Canadian Public Works Association, Canadian Society for Civil Engineering, Federation of Canadian Municipalities. (2016) Canadian Infrastructure Report Card 2016.

<sup>13</sup> Minister of Indigenous Services Mandate Letter (October 4, 2017)

## 1.1.2 Water and Wastewater Treatment in Atlantic First Nations

First Nations communities, through their Chiefs and Councils, are responsible for the design, construction, operation, and maintenance of their water systems, for which, until December 2020, they assumed 20% of the costs. They are also responsible for ensuring that water systems are operated by trained operators, for monitoring drinking water quality and for issuing drinking water advisories. As of 2019, Atlantic First Nations have resolved outstanding drinking water advisories which indicates that they are ready for a transfer of responsibilities from Canada to the AFNWA.

The Government of Canada supports water and wastewater services through funding. There are two types of water and wastewater delivery methods currently being offered in Atlantic First Nation communities:

- A First Nation community owns the water or wastewater system. Assets are funded by ISC. Public systems serve five or more residences or are public facilities.
- A nearby municipality under a Municipal Type Agreement<sup>14</sup> (MTA) supplies the Atlantic First Nation with treated water or receives its wastewater.

Because of the range in population and challenges of small system operations which do not benefit from economies of scale, the water and wastewater services delivered in each community vary in type, condition, and performance. In addition, there are differences in the levels of maintenance and support for the operators in the various communities. As a result, there are substantial gaps and lack of consistencies in the level of water and wastewater treatment standards, operation and maintenance costs, the methods of control and monitoring used (e.g. Supervisory Control and Data Acquisition (SCADA) systems), the level of autonomy and integration of cultural considerations.

## 1.2 The Problem

### Safe Drinking Water / Lower Level of Service

In 2019, First Nation communities continue to struggle daily with unsafe drinking water due to several First Nation specific water-related challenges as highlighted in Table 7.

*Table 7 First Nation Water-Related Challenges<sup>15</sup>*

Challenges	Brief Description
Location	Many First Nations are in difficult terrain with smaller systems, making it technically difficult and costly to provide water services. Water sources are often located off reserve, and it is difficult for First Nations to protect them.

<sup>14</sup> A Municipal Type Agreement (MTA) is an agreement which enables an Atlantic First Nation to receive a portion, or all their water and/or wastewater services from an adjacent municipal utility system. In some cases, gaps exist under an MTA (e.g. responsibilities for ongoing maintenance and repair, basis of cost, and means to dispute resolution) and inconsistencies exist between MTAs. For some communities, the MTA is between ISC and the municipality.

<sup>15</sup> Office of the Auditor General of Canada. "Report of the Commissioner of the Environment and Sustainable Development to the House of Commons: Chapter 5 Drinking Water in First Nation Communities." Minister of Public Works and Government Services Canada, 2005. Exhibit 5.10

Accountability	Federal Departments set requirements that make First Nations responsible for providing day-to-day drinking water. It is not clear who is ultimately accountable for the safety of the drinking water.
Costs & Financing	Providing drinking water is costly, and there is limited economy of scale. Water facilities serve a small population. Poor economic conditions limit First Nations' access to financing for water projects and to regular revenues to cover a portion of operation and maintenance costs. This creates a built-in shortfall in funding available for the safety of drinking water.
Operators	It is difficult to find and retain qualified and certified operators. While programs such as the Circuit Rider Training Program have been around for more than 10 years, operators may lack the incentive, or the community supports to attend the required training. As such many operators do not have the qualifications required. As most First Nations communities are small, there are few qualified candidates to enable time away from operations to pursue training.
Technical Standards	Provincial guidelines and regulations on drinking water are typically applied except when less stringent than federal standards. Support to help meet standards and enforcement mechanisms is limited.
Population Growth	On-reserve population is estimated to continue to increase. Between 2006 – 2016 First Nations populations in Atlantic Canada more than doubled (+101.6%). <sup>16</sup> Thirty-year forecasts (up to 2036) indicate that the average annual growth rate for First Nation will be higher than non-First Nations, and remain younger than the general population. <sup>17</sup> This may lead to difficulty in estimating population growth and economic development in each community to plan water systems that can meet drinking water needs for 10 to 20 years
Control & Oversight	Current regulatory, and administrative functions are distributed among multiple Federal, and Provincial organizations. As a result, First Nation lack the control to implement investments that meet their specific needs. Furthermore, the APC in partnership with Dalhousie University developed a regulatory framework for First Nations water and wastewater operations in Atlantic Canada based on the 16 elements defined by the Expert Panel on Safe Drinking Water for First Nations (2006), These trials led to a comprehensive set of Atlantic wide regulations for First Nations which were submitted to the Government of Canada in 2013. The challenge in the context of the AFNWA will be finding the appropriate body to enforce those regulations.
Funding	Funding for capital expenditures is allocated on a year-to-year basis. The funding provided to ISC regional offices for capital is unpredictable, allowing for uncertainty from the Government of Canada and First Nations on what can be planned for and accomplished. A lack of predictable funding has limited First Nations community's ability to proactively plan, construct and maintain water and wastewater infrastructure in a manner that optimizes their systems.

<sup>16</sup> Statistics Canada (2019 June 24) "Aboriginal peoples in Canada: Key results from the 2016 Census." Retrieved from <https://www150.statcan.gc.ca/n1/daily-quotidien/171025/dq171025a-eng.htm>

<sup>17</sup> Statistic Canada (2019 September 21). "Projections of the Aboriginal Population and Households in Canada, 2011 to 2036." Retrieved from [http://publications.gc.ca/collections/collection\\_2015/statcan/91-552-x2015001-eng.pdf](http://publications.gc.ca/collections/collection_2015/statcan/91-552-x2015001-eng.pdf)

These challenges are consistent with those identified in Atlantic First Nations communities by the Chiefs / Mayors meeting, Elders Meetings, First Nation Leaders and Operator Workshops, and the APC Water Forum to identify specific problems associated with Atlantic First Nations (see Section 1.4).

Like the national findings, a primary concern for Atlantic First Nations is their inability to provide consistent high-quality water and wastewater services for their residents.<sup>18</sup> Other similar concerns have been identified through engagement which included the inability to meet proposed and heightened new quality regulations, standards and guidelines, a lack of enforceable regulations and common standards, the inability to provide a uniform level of service and equity among communities<sup>19</sup>. Delivering water and wastewater services that did not meet regulatory standards negatively impacted public health, economic development, and protection of the environment.<sup>20</sup>

Providing services to small communities over a large geographic area presents a unique challenge for Atlantic First Nations due to the inefficiencies and the complexity with delivery to these locations. Distance between individual operations introduces issues associated with ensuring qualified and committed community water managers, operators and monitors have the support required to maintain these systems. Another problem is the need to ensure consistency of operator compensation, training and career development that is competitive with the municipal sector and can instill a consistent service culture and emergency response capability.

Lacking the integration of cultural and spiritual with the technical models of water and wastewater services further introduced barriers to the proper stewardship of water. For example, separating traditional knowledge from water and wastewater services has led many Atlantic First Nations to lose their awareness as to their stewardship role of water.

### 1.3 The Opportunity

Atlantic First Nations communities have identified the establishment of the Atlantic First Nations Water Authority (AFNWA) as a crucial element in their desires towards self-determination and as a true nation-to-nation solution to water issues facing their communities. As a result, fifteen (15) First Nations communities have proposed and are supportive of the AFNWA as

***an overarching governance and management body to specifically address the problems associated with water and wastewater services being provided to Atlantic First Nation communities.***

As a non-profit corporation owned by First Nations and governed by a Board of Directors which includes First Nation Chiefs, the AFNWA strengthen the important aspirations towards self-determination. In addition, it establishes a professional technical service organization responsible for the management and delivery of water and wastewater services to 15 member communities with a combined population of over 23,000 and 4,400 households. The AFNWA enjoys wide regional support from First Nations communities across Atlantic Canada who have been actively

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<sup>18</sup> Halifax Water and Accelerator Inc. "Preliminary Five Year Business Plan." June 2018. P. 1

<sup>19</sup> Halifax Water and Accelerator Inc. "Preliminary Five Year Business Plan." June 2018. P.10

<sup>20</sup> Halifax Water and Accelerator Inc. "Corporate Structuring for Atlantic First Nations Water Authority." August 2017 P.9.

engaged in the planning and development of the AFNWA.<sup>21</sup> Refer to Appendix 1 for a map of participating Atlantic First Nation communities.

The main opportunities with the establishment of the AFNWA are outlined below.

### 1.3.1 Safe Drinking Water & Wastewater Treatment

AFNWA can address the provision of safe, clean water and wastewater in all participating Atlantic First Nations by implementing a professionally managed utility with a business approach and service culture (with abilities to respond to emergencies). The formation of the AFNWA has been identified by the Atlantic First Nations as the best approach to meet current and emerging regulatory standards. The AFNWA, as the sole authority to control water for participant communities, will be able to provide a collective stewardship and responsibility for the Atlantic First Nation communities. Having a singular authority will provide a level of oversight that will provide consistent high-quality water and wastewater services for their residents, manage funding and revenues, support public health, economic development, and protection of the environment.

### 1.3.2 Self-Governance & Self-Determination

The Government's support for reconciliation with First Nation communities is consistent with the direction to modernize institutional structures to support self-governance, self-determination, and financial independence.

Federal funding will enable and support AFNWA to address historical needs, deferred maintenance, and update systems to a regulatory standard. Once this initial tranche of funding has been invested, AFNWA will be positioned to proactively operate, invest, and deliver services in a way that maximizes and achieves a greater level of financial independence. While individual Atlantic First Nation communities currently receive direct funding, the AFNWA will proactively manage the needs of all participating communities, maximum the investment within their systems, and lead the communities from a yearly funding request, to a longer-term approach for sustainability.

The AFNWA will transform water and wastewater service delivery for First Nation communities in Atlantic Canada by offering a new integrated cultural, traditional and industry best practices model of delivery that further supports self-determination. The AFNWA will have the authority and responsibility for water and wastewater services in member communities. It is a key element in Atlantic First Nation's self-determination, self-governance, and financial control. The AFNWA will be established as a non-profit organization which will be owned and operated directly by Atlantic First Nations. It will strengthen the roles of elected officials, utility board members, and senior management. Strategic and management decisions will be based on the best interests of the Atlantic First Nation communities whom the AFNWA serves, providing stronger accountability for the quality of drinking water and wastewater effluent to clients, communities, and regulators.

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<sup>21</sup> Media Release, Atlantic First Nations Water Authority Board of Directors meet with Minister Seamus O'Regan, May 3<sup>rd</sup>, 2019

### 1.3.3 Integrate Culture and Tradition

A key opportunity identified by Atlantic First Nations will be in their ability to integrate cultural and traditional knowledge within AFNWA in delivering water and wastewater services by educating communities, and the rising generation in the traditional, cultural, and scientific importance of water<sup>22</sup>. Integrating Two-Eyed Seeing and Wise Practices are two key examples identified that will further integrate a respect for the spiritual and physical nature of water<sup>23</sup>.

### 1.3.4 Financial Independence

AFNWA will develop over time operational efficiencies by harmonizing / implementing uniform technologies, efficiencies in operations and maintenance and human resource qualifications across all communities. This will directly align the Government of Canada’s aspirations for a new fiscal relationship, by having greater control by First Nations.

AFNWA has also been designed to accommodate other communities joining the water authority in the future. With more participation, AFNWA will be able to realize greater efficiencies and benefits due to the larger number of communities that are being served. AFNWA continues to engage in conversations with these communities and has planned to accommodate additional participation in the future.

Operationally, AFNWA will prioritize needs and implement a proactive investment approach to ensure water and wastewater systems are operating efficiently and receiving the necessary capital investments to address needs. Administrative, operations and maintenance, and purchasing are a few of the operating efficiencies that can be anticipated.

AFNWA will also be able to negotiate with neighboring municipalities in an equal and consistent way. This approach will serve the collective interests of the Atlantic First Nations communities and provide a further example of shared leadership and accountability values.

### 1.3.5 Economic Development

Economic benefits stemming from AFNWA investment will benefit individuals located within Atlantic First Nations communities. Examples may include such initiatives as providing education and long-term training for science technology engineering and mathematics, providing well-paying employment opportunities for Atlantic First Nations people, and the establishment of economic development activities including employment, job training, careers and leadership training. Short-term benefits would include construction jobs during the capital investment phase of infrastructure projects in the participant communities. Participant Atlantic First Nation communities will also experience an increase in economic development in the medium to long-term, for example, the AFNWA will make indigenous procurement a priority. AFNWA will support communities who wish to provide water and/or wastewater services to commercial developments

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<sup>22</sup> Halifax Water and Accelerator Inc. “Corporate Structuring for Atlantic First Nations Water Authority.” August 2017. P.5

<sup>23</sup> Halifax Water and Accelerator Inc. “Corporate Structuring for Atlantic First Nations Water Authority.” August 2017. P.5.

that may be located on reserves. Providing this level of service will further contribute to the increase in the economic activities of Atlantic First Nation communities.

### 1.3.6 A Model for First Nations Across Canada

AFNWA will provide an important precedent for First Nations communities across Canada as they consider self-governance and self-determination and contemplate coordinated service delivery across multiple sectors. As a scalable delivery model, the AFNWA governing structure can be utilized by First Nations in other regions across Canada.

## 1.4 The Evolution

The evolution of the AFNWA has been the result of over 10 years work by Atlantic First Nations and various stakeholders to build legal, regulatory, Atlantic First Nation community and Federal Government support.<sup>24</sup> In 2005 it was identified that First Nations “did not benefit from a level of drinking water comparable to that available to people living off reserves because provincial legislation and regulations are not applied on reserves. Consequently, First Nations communities did not have a regulatory regime to govern drinking water.”<sup>25</sup> Between 2006 and 2008 further studies<sup>26</sup> identified that regulations alone would not be effective in ensuring safe drinking water unless accompanied by investment in human resources and physical assets. Continued investment in comprehensive consultations were identified as a requirement to improve water treatment and management practices for First Nation communities.

The Government announced in 2008 the First Nations Water and Wastewater Action Plan (FNWWAP) which provided funding for treatment facility construction and renovation, operation and maintenance of facilities, training of operators and related public health activities on-reserve. Through this investment, the Government laid the foundation for the improvement of health and quality of life of people in First Nation communities by assisting First Nations to provide better water and wastewater services to their residents.

Additional assessments began in 2009 that included representatives from INAC, Environmental Health Officers from Health Canada and Tribal Council Representatives as well as consultants. In March 2009, 13 engagement sessions on the development of a proposed legislative framework for drinking water and wastewater in First Nations communities were held across the country focusing on the desirability of federal, safe water legislation pertaining to First Nation communities, and to ascertain First Nation perspectives on developing federal legislation that would call for the incorporation by reference of provincial/territorial regulations relating to potable water and wastewater. These assessments<sup>27</sup> informed the need and size for the Government's

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<sup>24</sup> Atlantic Policy Congress “APCs Clean Water Initiative’s (CWI) Atlantic First Nation Water Authority (AFNWA) Chronology.” 2016. Appendix A, B and C.

<sup>25</sup> 2005 Report of the Commissioner of the Environment and Sustainable Development to the House of Commons – Chapter 5: Drinking Water in First Nations Communities” by the Auditor General

<sup>26</sup> Expert Panel on Safe Drinking Water for First Nations (2006) and the Senate Standing Committee on Aboriginal Peoples (2007)

<sup>27</sup> Including “Summary Report of the Impact Analyses of the Proposed Federal Legislative Framework for Drinking Water and Wastewater in First Nations Communities” (April 17, 2009)

future, long-term investment strategy in water and wastewater infrastructure systems in First Nations communities across Canada.

Between 2010 and 2013, the United Nations General Assembly recognized the right to safe and clean drinking water and sanitation as a human right, ISC released the National Assessment of First Nation Water and Wastewater Systems, and the House of Commons indicated that federal governments have not made satisfactory progress on past commitments and recommendations related to water and wastewater programs<sup>28</sup>. This included the call for a regulatory regime to be implemented in First Nations communities because provincial legislation and regulations are not applied on First Nation reserves.

Within the Atlantic region, the Atlantic Policy Congress of First Nations Chiefs Secretariat (APC)<sup>29</sup> developed the First Nations Clean Water Initiative - Atlantic Region (FNCWI-AR) which led to the creation of a First Nations Water Authority that would ultimately become responsible for the upgrades, operation, and long-term maintenance of water and wastewater infrastructure on member First Nation communities in the Atlantic Region. In 2014, 24 Atlantic First Nations communities signed Band Council Resolutions (BCR) to facilitate updating asset condition and cost analysis of current water and wastewater systems in their communities and to initiate the required engineering work, land surveys and environmental assessments.<sup>30</sup> APC initiated this to improve the planning of future investments in the water authority's infrastructure.

In addition to advancing the understanding on the current state of service delivery in the communities and the national work on regulatory frameworks and regulations, First Nations, APC, INAC, First Nations and Inuit Health Branch (HC-FNIHB) and ISC held multiple outreach activities, workshops and stakeholder engagements between 2009 and 2017. Topics have ranged from the possible benchmark regulations to the composition of the AFNWA using engagements such as:

- Water Forums
- Chief / Mayor's and Elders Meetings
- National Surveys
- Atlantic First Nation Leaders Workshops
- Operator Workshops

Through this extensive consultation with First Nation Chiefs, Elders, system operators, community outreach activities and many others, APC was able to develop a recommended corporate structure, and a preliminary five-year business plan<sup>31,32</sup> for the AFNWA. As a result of

<sup>28</sup> Status Report to the Auditor General of Canada

<sup>29</sup> Atlantic Policy Congress (APC) of First Nations Chiefs Secretariat, is a federally incorporated (1995) policy research and advocacy Secretariat for 31 Mi'kmaq, Maliseet, Passamaquoddy and Innu Chiefs, Nations and Communities in Atlantic Canada, Quebec and Maine.

<sup>30</sup> Atlantic Policy Congress "APCs Clean Water Initiative's (CWI) Atlantic First Nation Water Authority (AFNWA) Chronology." 2016. Table 3, p. 4

<sup>31</sup> Halifax Water and Accelerator Inc. "Preliminary Fire Year Business Plan." June 2018.

<sup>32</sup> Halifax Water and Accelerator Inc. "Corporate Structuring for Atlantic First Nations Water Authority." August 2017.

the success of this stakeholder engagement and notional support from ISC, the AFNWA was officially incorporated 18 July 2018 under the Canada Not-for-profit Corporations Act. At its first Board meeting on July 11, 2018, the AFNWA endorsed the recommended organizational structure for the utility and the preliminary five-year business plan. Refer to Appendix 2 for a full detailed list of the engagements, workshops, meetings, and forums.

## 2 Current State

### 2.1 Participating Atlantic First Nation Communities

Atlantic First Nations communities located within Nova Scotia, New Brunswick and Prince Edward Island have been engaged as to their interest in participating in the AFNWA. Those Atlantic First Nations communities who have confirmed their interest, as of February 2020 in participating and have signed Band Council Resolutions (BCRs) have been identified in Table 8. As additional Atlantic First Nations communities show interest, and sign BCR's they will be allowed to participate with the AFNWA. As of May 2019, fifteen (15) Atlantic First Nation communities located within three provinces have expressed interest in establishing the AFNWA (Table 8) with an additional seven (7) remaining interested but have not formally signed a BCR. This represents a total registered population of 24,000 within the participating AFNWA nation communities with communities ranging in size between 340 and 4,600.

*Table 8 Atlantic First Nation Communities expressed interest (w. signed BCRs) in AFNWA.*

Participating Atlantic First Nations Communities	Province	Registered Population <sup>33</sup> (2016)
Abegweit First Nation	PEI	338
Acadia First Nation	NS	1,664
Eel River Bar First Nation	NB	772
Elsipogtog First Nation	NB	3,456
Eskasoni First Nation	NS	4,642
Glooscap First Nation	NS	393
Lennox Island First Nation	PEI	1,004
Membertou First Nation	NS	1,573
Millbrook First Nation	NS	1,995
Oromocto First Nation	NB	743
Paqtnkek Mi'kmaw First Nation	NS	599
Pictou Landing First Nation	NS	672
Potlotek First Nation	NS	773
Sipekne'katik First Nation	NS	2,771
Tobique First Nation	NB	2,553
	<b>Total</b>	<b>23,948</b>

The commitment of these 15 communities represents a significant critical mass of Atlantic First Nation communities, and the populations they service. The inclusion of these Atlantic First Nation

<sup>33</sup> Indigenous and Northern Affairs Canada. (June 18, 2019) "First Nation Profiles." Retrieved from <https://fnppn.aadnc-aandc.gc.ca/fnp/Main/Search/SearchFN.aspx?lang=enghttps://fnppn.aadnc-aandc.gc.ca/fnp/Main/Search/SearchFN.aspx?lang=eng> March 3, 2020.

communities provides a significant percentage by population [80%] of First Nation communities participating in the AFNWA.

To facilitate the opportunity to incorporate future Atlantic First Nation communities, the AFNWA has been designed to be scalable. As of the March 2020, AFNWA is aware of an additional seven (7) communities that have expressed interest to participate but have yet to formally commit (Table 9).

*Table 9 Atlantic First Nation Communities expressed interest (w/o BCRs) in AFNWA.*

Atlantic First Nations Communities Expressing Interest	Province	Registered Population <sup>34</sup> (2016)
Buctouche First Nation	NB	126
Indian Island First Nation	NB	206
Kingsclear First Nation	NB	1,057
Metepenagiag First Nation	NB	695
St Mary's First Nation	NB	1,960
Waycobah First Nation	NS	931
Woodstock First Nation	NB	1,123
	<b>Total</b>	<b>6,098</b>

Tables 10 and 11 below identify the current type of system of the facility for the participating Atlantic First Nation communities. These assessments are a snapshot in time because water and wastewater conditions and their associated level of risks may improve or further deteriorate based on future levels of investment, and impact of operation. Implementing a regular inspection protocol will ensure a current understanding of each system.

*Table 10 Participating Atlantic First Nations Communities by type of Water Systems*

Groundwater (8 Systems)	Municipal Type Agreement (6 Systems)	Surface Water (1 System)
<ul style="list-style-type: none"> <li>• Abegweit</li> <li>• Elsipogtog</li> <li>• Eskasoni</li> <li>• Lennox Island</li> <li>• Paqtnekek</li> <li>• Pictou Landing</li> <li>• Sipekne'katik</li> <li>• Tobique</li> </ul>	<ul style="list-style-type: none"> <li>• Acadia</li> <li>• Eel River Bar</li> <li>• Glooscap</li> <li>• Membertou</li> <li>• Millbrook</li> <li>• Oromocto</li> </ul>	<ul style="list-style-type: none"> <li>• Potlotek</li> </ul>

<sup>34</sup> Indigenous and Northern Affairs Canada. (2019, June 18) "First Nation Profiles." Retrieved from <http://fnppn.aandc-aadnc.gc.ca/fnp/Main/Search/SearchFN.aspx?lang=eng>

Table 11 Participating Atlantic First Nations Communities by type of Wastewater Systems<sup>35</sup>

MTA (5 systems)	Facultative or Aerated Lagoons (6 systems)	Mechanical Plant (2 systems)	Small Communal System (15 Homes) (1 System)	Private (1 Community)
<ul style="list-style-type: none"> <li>Acadia</li> <li>Eel River Bar</li> <li>Membertou</li> <li>Millbrook</li> <li>Oromocto</li> </ul>	<ul style="list-style-type: none"> <li>Elsipogtog</li> <li>Lennox Island</li> <li>Pictou Landing</li> <li>Potlotek</li> <li>Sipekne'katik</li> <li>Tobique</li> </ul>	<ul style="list-style-type: none"> <li>Eskasoni</li> <li>Paqtnkek</li> </ul>	<ul style="list-style-type: none"> <li>Abegweit (Scotchfort)</li> </ul>	<ul style="list-style-type: none"> <li>Glooscap</li> </ul>

## 2.2 Regulatory Framework

Currently there are three Federal departments involved in the regulation and service provision of delivering safe drinking water on reserves. Their roles can be summarized as follows

- Indigenous Services Canada provides funding – including funds for capital construction, upgrading, operating and maintenance costs – to First Nations for the provision of water services to First Nations communities. ISC also provides technical advice, ensures value for money and ensures source water protection for First Nations on reserves. Additional support has been provided to First Nations in developing their own source water protection plans<sup>36</sup>.
- Health Canada establishes Canadian Drinking Water Quality Guidelines
- Indigenous Services Canada, First Nations and Inuit Health Branch ensures the delivery of drinking water monitoring programs on reserves located south of the 60<sup>th</sup> parallel, either directly or in an oversight (non-enforcement) role
- Environment and Climate Change Canada is involved in source water protection through its powers to regulate wastewater discharge into federal waters or into water generally where water quality has become a matter of national concern, and to enforce effluent discharge standards into water throughout Canada.

Developing of a compliance and enforcement framework is to be co-developed with ISC. Appendix 3 identifies key developments that have further characterized, commented on and in some cases attempted to address the regulatory gap relating to water and wastewater services in First Nations Communities

<sup>35</sup> Indigenous and Northern Affairs Canada. (2019 June 18). "National Assessment of First Nations Water and Wastewater Systems - Atlantic Regional Roll-Up Report." Retrieved from <https://www.aadnc-aandc.gc.ca/eng/1314206899796/1314207059703>

<sup>36</sup> Refer to Appendix 2 for an overview of key AFNWA engagements

While not regulated by provincial regulatory standards, Atlantic Canada First Nation communities must introduce regulatory requirements to establish water and wastewater quality standards. The introduction of requirements that go beyond secondary level treatments to safeguard inland receiving waters, and the influence of surface water infiltration may become a requirement which in turn will require additional funding. In these situations, minimum end of pipe effluent standards will be required<sup>37</sup>, including further disinfection and filtration upgrades.<sup>38</sup> As a result, AFNWA will need to respond as future regulations are developed, approved, and implemented.

### **Quality Environmental Management System [QEMS]**

The OCWA Report recommends a QEMS for all water and wastewater systems that fall under the AFNWA umbrella. This is a systematic way of ensuring environmental and public health outcomes are consistently met.

AFNWA will consider the implementation of a QEMS in the future for possible ISO 14001 certification. The first step will be to implement water and sanitation safety plans which are complementary to QEMS. AFNWA propose to provide its plans for implementing water and sanitation safety plans together with the associated costs in the Business Plan.

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<sup>37</sup> Introduced as part of the 2009 Canadian Council of the Ministers of the Environment and required under the 2012 Wastewater Systems Effluent Regulations

<sup>38</sup> Halifax Water and Accelerator Inc. "Preliminary Fire Year Business Plan." June 2018. P.15

## 3 Environmental Analysis

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### 3.1 Strategic Context

The Government of Canada continues to strive for reconciliation with First Nations and in ensuring the establishment of self-determination, self-governance and financial control. To enable this requires the modernization of institutional structures and governance so that First Nations can build the capacity to support a new fiscal relationship.<sup>39</sup>

Moving towards Indigenous self-government requires the support of the Government of Canada, particularly under the Indian Act in the overseeing of existing services and in the provision of community infrastructure, emergency management, water, education, moneys and trusts, and registration. In the Prime Minister's mandate letter to the Minister of Indigenous Services the following direction was provided:

***“Ensure the successful delivery of the significant investments made in Indigenous services through Budget 2016 and Budget 2017. This includes new and repaired housing, ensuring First Nations children on reserve receive a quality education, and eliminating all long-term boil water advisories by 2021 as a key measure in ensuring First Nations people on reserve have access to clean drinking water.”<sup>40</sup>***

To further support the goals of First Nation self-determination, the Indigenous and Northern Affairs department was divided in 2017 into two departments: Crown-Indigenous Relations and Northern Affairs and the Department of Indigenous Services Canada. Receiving Royal Assent on June 21, 2019<sup>41</sup>, this separation and establishment allows one department to focus on a new relationship with Indigenous people, such as First Nations working on self-government agreements, while the other will continue providing services for all First Nations.

AFNWA, as a service delivery organization with the authority to govern participating Atlantic First Nation communities, will contribute to the economic development of communities, and in the creation of jobs for Atlantic First Nation communities which will assist in realizing self-determination and financial independence. As AFNWA will operate regionally, investments will be made in the local community to ensure that qualified water and wastewater employees remain and provide benefits to communities.

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<sup>39</sup> Justin Trudeau, Prime Minister of Canada. (2019, June 18) “Minister of Indigenous Services Mandate Letter” Retrieved from <https://pm.gc.ca/eng/minister-indigenous-services-mandate-letter-october-4-2017>

<sup>40</sup> Justin Trudeau, Prime Minister of Canada. (2019, June 18) “Minister of Indigenous Services Mandate Letter” Retrieved from <https://pm.gc.ca/eng/minister-indigenous-services-mandate-letter-october-4-2017>

<sup>41</sup> Parliament of Canada (2019, June 29) Retrieved from <https://www.parl.ca/LegisInfo/BillDetails.aspx?Language=E&billId=10404016>

On July 10, 2018, the AFNWA have adopted the following mission statement:

*“Provision of safe, clean drinking water and wastewater in all participating First Nations communities in Atlantic Canada, delivered by a regional water authority owned and operated by First Nations”*

### 3.2 Cultural and Spiritual Alignment

For Atlantic First Nations integrating the cultural and spiritual traditions for Atlantic First Nation communities is a key component in delivery of water and wastewater services, and an important guide for the AFNWA<sup>42</sup>.

Figure 2 Cultural and Spiritual Significance of Water

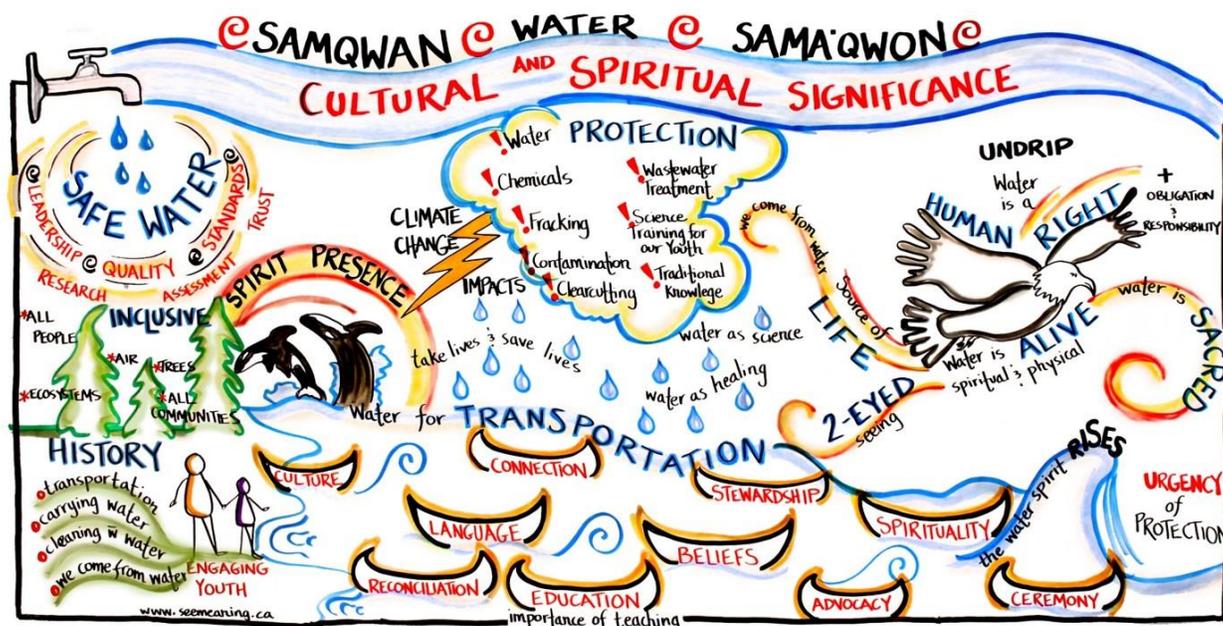


Figure 2 and the list below summarizes the wisdom gathered from engagement with Atlantic First Nations Elders and cultural and spiritual importance of water:<sup>43</sup>

- Water is alive, is both spiritual and physical and an important part of many ceremonies. Examples of ceremonies include ceremonies for the water spirit, ceremonies that take your troubles away, offerings being made into water.
- Water can take life and it can save life. Water plays a central role for the community and family activities. Clean water is needed to make Grandmother recipes, it is linked to good health, and serves as a healer.

<sup>42</sup> Halifax Water and Accelerator Inc. “Corporate Structuring for Atlantic First Nations Water Authority.” August 2017. Appendix C

<sup>43</sup> Halifax Water and Accelerator Inc. “Corporate Structuring for Atlantic First Nations Water Authority.” August 2017. Appendix C

- Water is sacred. We all come from water and it is the source of life for all living things. A child is carried in water. The water comes before the child is born. Traditional teachings also included the identification that First Nation women have a sacred connection to water.
- Water and nature have rights. Humans have the responsibility to respect and preserve those rights. Stewarding environmental health, the health of Mother Nature is a responsibility.
- First Nations believe in the shared ownership of land and water rather than individual ownership.
- Atlantic First Nations have both formal and informal leadership, and a shared leadership in the communities between formally elected councils, operating under the delegated authority under the Indian Act, and informal leaders.

Atlantic First Nations have identified the importance of Two-Eyed Seeing and Wise Practices and their application to the AFNWA.

Two-Eyed Seeing integrates non-indigenous science-based decision making while integrating and respecting indigenous Atlantic First Nations traditional knowledge and culture. Experience has highlighted that implementation of non-indigenous solutions have not fully resolved the issues associated with water and wastewater systems for Atlantic First Nation communities. A Two-Eyed Seeing approach would allow AFNWA to address some of the harm that has been created by not integrating culture and tradition into water and wastewater services. Elders have identified that Atlantic First Nations currently have a lack of trust for water.<sup>44</sup> Embedding culture through Two-Eyed Seeing will utilize the best of both approaches to help restore the relationship between communities and water, it will reconnect people to the source of water and the importance of it, and reconcile quality, culture, and science.

Elders have also identified 'Wise Practices', practices which provide "locally appropriate actions, tools, principles or decisions that contribute to the development of sustainable and equitable conditions."<sup>45</sup> These practices include the need for leaders to understand:

1. Identity and culture (have a strong understanding and grounding in their culture, traditional knowledge, and values, and in their people's historical connection to their traditional territories)
2. Leadership
3. Strategic vision and planning (system thinkers who take a holistic approach)
4. Good governance and management
5. Accountability and stewardship
6. Performance evaluation

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<sup>44</sup> Halifax Water and Accelerator Inc. "Corporate Structuring for Atlantic First Nations Water Authority." August 2017. Appendix C

<sup>45</sup> Brown, Keith G., Doucette, Mary Beth, Tulk, Janice. (2016) *Indigenous Business in Canada*, p.51

## 7. Collaborations, partnerships, and external relationships<sup>46</sup>

Refer to Appendix 4 for further clarification on how the AFNWA strategically aligns and supports Atlantic First Nations communities, Atlantic First Nation Leadership, the Government of Canada, standards and regulatory organizations, regional or neighbouring water and wastewater services or authorities.

### 3.3 Precedent Scan

Conducting a survey across Canada has revealed there are no directly comparable national precedents that exists for the delivery of water and wastewater service by one First Nation governing body. The following examples have similarities to the AFNWA

#### **British Columbia’s First Nations Health Authority**

In British Columbia, the First Nations Health Authority (FNHA) was the first provincewide health authority of its kind in Canada. In 2013, the FNHA assumed the programs, services, and responsibilities formerly handled by Health Canada’s First Nations Inuit Health Branch - Pacific Region. FNHA is part of a unique health governance structure that includes political representation and advocacy through the First Nations Health Council, and technical support and capacity development through the First Nations Health Directors Association. Collectively, this First Nations health governing structure works in partnership with B.C. First Nations to improve the health and well-being of First Nations and Aboriginal people in British Columbia.

Specific benefits of the FNHA include increasing political representation, improving health of First Nations, move toward self-governance and increasing operational/management capacity. AFNWA was informed by the establishment of the FNHA and the Health Canada’s First Nations Inuit Health Branch - Pacific Region as they provided an important milestone for First Nations.

#### **Small Municipal Amalgamations**

While similar organizations to the AFNWA have not been introduced in other First Nations communities, amalgamations of smaller utility operations with a central management “hub” is a well-tested model. Municipal amalgamations in Ontario provide the promise of increased utility efficiency. For example, the City of Kawartha Lakes amalgamated 18 municipalities and now has 21 water systems and five wastewater systems. Utilizing a hub model provides a centralized, integrated logistics system designed to keep costs down. Hub and spoke utilities centers receive resources (i.e. expertise, products) from many different origins, consolidate the products, and send them directly to destinations. The hub model was also advanced in recommendations contained in the publication, *Watertight: the case for change in Ontario’s water and wastewater sector*.<sup>47</sup>

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<sup>46</sup> Halifax Water and Accelerator Inc. “Corporate Structuring for Atlantic First Nations Water Authority.” August 2017. P.5-6

<sup>47</sup> *Watertight, the case for change in Ontario’s water and wastewater sector*, Published by Ontario Ministry of Public Infrastructure Renewal, 2005

Benefits include increasing economies of scale and efficiencies in operations, provision of services in remote locations, autonomy in service delivery, and a flexible organizational model to implement operating efficiencies.

### **Small Utility Amalgamations (Co-Operatives)**

Co-operative (co-op) utilities exist across Canada which are involved in providing such services as gas, electricity, other forms of energy and water supply services. These corporations are formed under specific federal, provincial or territorial co-operative legislation, often owned by an association of persons seeking to satisfy common needs.<sup>48</sup> According to Innovation, Science and Economic Development reporting in 2013, there were 212 reporting utility co-ops' in 2013. Approximately half of these (107) are in Alberta and largely focused on natural gas and water. The balance, (105) are outside of Alberta and are involved in water supply activities such as agriculture irrigation and rural community water supply.<sup>49</sup>

Benefits include increasing economies of scale and efficiencies in operations for small customers, bulk purchasing, and consistent coordination of service requirements, contracts etc.

### **Regionalization**

Many municipalities in Canada, including those in Nova Scotia, have made significant advances with regionalization for service delivery. In Nova Scotia, these include Queens County, Cape Breton Regional Municipality and Halifax Regional Municipality (HRM). With respect to HRM, service is delivered through Halifax Water, a body corporate utility regulated by the Public Utilities Act through the Nova Scotia Utility and Review Board. Halifax Water's governance and approach to service delivery served as model to guide the formation of the AFNWA as it has been recognized as a leading best in class utility.

Benefits include increasing economies of scale and efficiencies in operations, consistent level of and reliability of service, centralization of expertise distributed to service area, and tailored service to a geographic region.

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<sup>48</sup> Innovation, Science and Economic Development Canada, Government of Canada. (2019 March 15). "Co-operatives in Canada – 2013" Retrieved from [https://www.ic.gc.ca/eic/site/061.nsf/eng/h\\_03070.html](https://www.ic.gc.ca/eic/site/061.nsf/eng/h_03070.html)

<sup>49</sup> Innovation, Science and Economic Development Canada, Government of Canada. (2019 March 15). "Co-operatives in Canada – 2013" Retrieved from [https://www.ic.gc.ca/eic/site/061.nsf/eng/h\\_03070.html](https://www.ic.gc.ca/eic/site/061.nsf/eng/h_03070.html)

## 4 Analysis and Recommendation

### 4.1 Preliminary Evaluation Criteria

To facilitate the identification of viable options, evaluation criteria were developed from stakeholder consultations and drawn from the reports and work of APC (including Halifax Water, Accelerator Inc) on behalf of AFNWA.<sup>50</sup> The following Table 12 provides a summary of the primary drivers, and screening criteria utilized in the corporate structure analysis and required to meet the identified business needs and desired outcomes.

*Table 12 AFNWA Evaluation and Screening Drivers and Criteria*

Drivers	Criteria
<b>Safe Drinking Water &amp; Wastewater Treatment</b>	Meet regulatory standards
	Manages or transfers service delivery risk
	Provides a direct accountability for quality of services to AFNWA organization and communities
	Optimizes response time for issues and actions
<b>Self-Governance</b>	Enables Atlantic First Nations self-determination
	Focuses and fosters relationships and connections with local communities
	Creates efficiency in operations (e.g. standardized approach to system design, reduces duplication, simple accounting, reporting, communications, continuity between head office and communities)
	Provides coordination and equality across communities
	Responsiveness to operations, engineering, corporate services, and communications and public relations
	Establishes operational knowledge and expertise close to communities
<b>Cultural and Spiritual</b>	Cultural and spiritual is integrated into service delivery
<b>Financial Independence</b>	Creates equal investment in FN assets
	Improves FN access to capital for investment
<b>Economic Development</b>	Stimulates economic development
	Creates FN employment, staffing, career development and mentorship
<b>Model for First Nations</b>	Creates precedent for First Nations communities across Canada as they consider self-governance and self-determination

Aligning to these drivers and screening criteria will ensure AFNWA has a board and management structure that can meet the technical, cultural, and financial components for water and wastewater delivery. Ensuring the AFNWA structure is aligned with these drivers will ensure ongoing success once in operation.

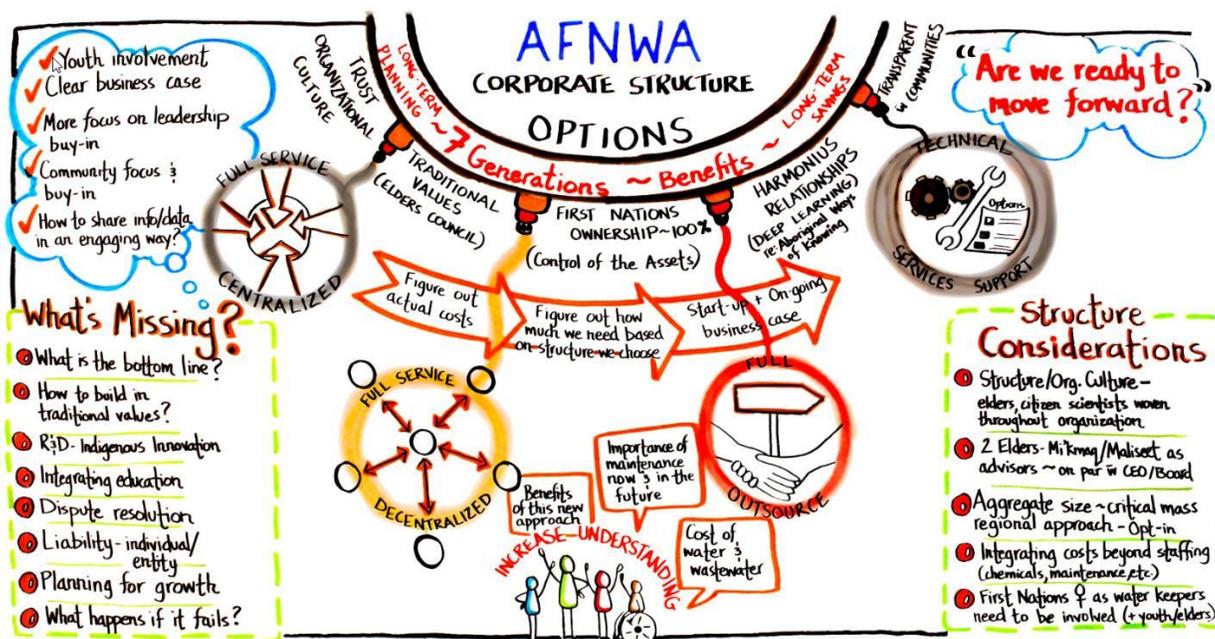
<sup>50</sup> Halifax Water and Accelerator Inc. “Corporate Structuring for Atlantic First Nations Water Authority.” August 2017. Halifax Water and Accelerator Inc. “Preliminary Fire Year Business Plan.” June 2018.

To further support the Government of Canada’s commitment to advance gender equality in Canada, a Gender-based Analysis (GBA+) assessment and screening of the AFNWA opportunity and the content associated with this business case is included. Refer to Appendix 5 for a summary of the GBA+ screening.

## 4.2 Viable Options

Identifying viable business model options to match the purpose, mission, and structure of the AFNWA has been the result of years of effort by the Atlantic Policy Congress, and careful consideration by the Atlantic First Nations communities.<sup>51</sup> Through this work four potentially viable business models have been identified for the AFNWA (Figure 3).

Figure 3 Corporate Structure Options<sup>52</sup>



These options ranged from full-service provider to an oversight role with services contracted to an outside agency.

- Full Service Centralized (FSC)
- Full Service De-centralized (FSD)
- Full Outsourced (FOS)
- Technical Services Support (TSS)

<sup>51</sup> Halifax Water and Accelerator Inc. “Corporate Structuring for Atlantic First Nations Water Authority.” August, 2017. Halifax Water and Accelerator Inc. “Preliminary Fire Year Business Plan.” June 2018.

<sup>52</sup> Atlantic Policy Congress, First Nation Leaders Workshop, 2017, May 24.

The FSC, FSD, FOS and TSS business models vary in their ability to meet the management structure, level of service, risk management considerations and aspirations to achieve self-determination and governance. Despite this variation, the FSC, FSD, FOS and TSS business models are organizationally structured around a Corporate Services Department, Communications Department, Operations Department and an Engineering Department.

A detailed summary of each option and high-level pros and cons (refer to Appendix 6) are based on research conducted by Halifax Water and Accelerator Inc., and stakeholder group consultants conducted by APC<sup>53</sup>. Conclusions and recommendations are also based on outreach activities, which included meetings and workshops with First Nations Chiefs, Elders and water system operators.<sup>54</sup>

### 4.3 Option Analysis & Recommendation

The current state, and the four models fully described in Appendix 6 provide varying levels of service and benefits to communities served by the AFNWA. Table 13 identifies the evaluation criteria that was used for screening and analysis of the viable options. Based on the analysis, the Full Service Decentralized (FSD) corporate structure has been recommended by Atlantic First Nations communities as being able to provide the highest level of service and direct benefits to the communities served. The FSD also has the most potential for the utility to establish relationships with the hub and spoke model so often referenced in the best practice review.

Table 13. AFNWA Evaluation and Screening Criteria

Criteria	Full Service – Centralized (FSC)	Full Service – Decentralized (FSD)	Full Outsource (FOS)	Technical Services Support (TSS)	Current State
<b>Safe Drinking Water &amp; Wastewater Treatment</b>					
Meet regulatory standards	✓	✓	✓	✓	
Manages or transfers service delivery risk	✓	✓	✓	✓	
Provides a direct accountability for quality of services to AFNWA organization and communities	✓	✓		✓	
Optimizes response time for issues and actions		✓			
<b>Self-Governance</b>					
Enables Atlantic First Nations self-governance	✓	✓			
Focuses and fosters relationships and connections with local communities	✓	✓			

<sup>53</sup> Refer to Appendix 11 for a list of key consultant reports

<sup>54</sup> Atlantic Policy Congress “APCs Clean Water Initiative’s (CWI) Atlantic First Nation Water Authority (AFNWA) Chronology.” 2016. Appendix C

Criteria	Full Service – Centralized (FSC)	Full Service – Decentralized (FSD)	Full Outsource (FOS)	Technical Services Support (TSS)	Current State
Creates efficiency in operations	✓	✓		✓	
Provides coordination and consistency across communities	✓	✓	✓		
Responsiveness to operations, engineering, corporate services, and communications and public relations		✓	✓		
<b>Cultural and Spiritual</b>					
Atlantic First Nations cultural and spiritual aspects can influence service delivery	✓	✓			✓
<b>Financial Independence</b>					
Establishes operational knowledge and expertise close to communities	✓	✓			✓
Creates FN asset equity and ownership	✓	✓			
<b>Economic Development</b>					
Stimulates economic development	✓	✓			
Creates FN employment, staffing, career development and mentorship	✓	✓		✓	
<b>Model for First Nations</b>					
Creates precedent for First Nations communities across Canada	✓	✓			
<b>Total</b>	Less Preferred	<b>Preferred Option</b>	Not Preferred	Not Preferred	Not Preferred

The Full Service – Decentralized (FSD) organizational structure provides the AFNWA with an opportunity to decentralize specific functions to the communities in order to meet the needs of the customers in the different geographic regions. Often referred to as a “Hub and Spoke” model, each regional area would be sized and staffed to best align with the needs of that region and the specific communities being served. The FSD enables the creation of specific centres or operational knowledge and expertise close to communities, creates local hubs with the responsibility to provide day to day operational decision making, and with organizational wide direction and support. The FSD model will also allow for more direct interaction with customers and foster relationships within the communities.

Utilization of the FSD model establishes an important framework that can accommodate the inclusion of additional communities. While currently operating under a 15-community model, this scalability allows the AFNWA to accommodate the remaining Atlantic First Nations communities efficiently and without significant organizational modifications.

## 5 Project Opportunity and Description

### 5.1 Project Description

Establish the AFNWA, under a Full Service – Decentralized (FSD) model as a permanent and independent water authority owned by Atlantic First Nations who will be responsible for the provision of water and wastewater services in those committed Atlantic First Nation communities (Figure 4).

Figure 4 AFNWA Vision and Description



Under the FSD model, AFNWA will be able to directly address the ongoing concern in Atlantic First Nations communities about their ability to provide consistent high-quality water and wastewater services for their residents. The formation of the AFNWA under the FSD model provides the best approach for Atlantic First Nations to meet these new standards on a sustainable basis.

Implementation of the AFNWA will advance the First Nations and the Government of Canada aspirations to achieve self-governance. To accomplish this, the legal and formal organizational structure for the AFNWA needs to be established complete with the legal authorities, regulatory oversight, policies, and processes. The AFNWA will be owned by Atlantic First Nations and governed by a professional and geographically represented Board, the majority of whom will be from Atlantic First Nations. The Board of the AFNWA will consist of up to 15 directors, 12 of whom will be Atlantic First Nations selected by the owners and 3 of whom will be technical

experts appointed by the owner-directors. In addition, the Board will have the wise guidance of an Elders Council.<sup>55</sup>

AFNWA will be operated regionally based on the FSD model, by qualified water and wastewater management and employees as a non-profit corporation under the Canada Not For-Profit Corporations Act. Structuring the AFNWA under the FSD model will allow for the most effective and efficient operation with the best opportunity to establish relationships with the communities served by the AFNWA. This relationship is important to ensure traditional knowledge and values are integrated into the water utility for long term sustainability. The FSD also maximizes benefits to local communities with all offices located in Atlantic First Nation communities and services obtained from local contractors. This is a transformative project for First Nation communities with the business model based on leading, successful water utilities in non-indigenous communities (e.g., Halifax Water; EPCOR).

The formal establishment of AFNWA will also require the integration of cultural and spiritual, Two-Eyed Seeing and Wise Practices to ensure that the physical and spiritual significance of water by Atlantic First Nations is sustained, and that the shared responsibility of Atlantic First Nations will respect and preserve those rights. Incorporating Atlantic First Nations human resources will strengthen AFNWA's ability to ensure ongoing collaboration, public outreach and communication, and the sensitivity to incorporate important culture and tradition into the operations within its member communities.

## 5.2 Participating Atlantic First Nations Communities with Band Council Resolutions

As identified in 2.1, the following fifteen (15) Atlantic First Nations communities located within Nova Scotia, New Brunswick and Prince Edward Island have committed to participating in the AFNWA.

*Table 14 Participating Communities of the Atlantic First Nation Water Authority*

Participating Communities		
Abegweit First Nation	Glooscap First Nation	Paq'tnkek First Nation
Acadia First Nation	Lennox Island First Nation	Pictou Landing First Nation
Eel River Bar First Nation	Membertou First Nation	Potlotek First Nation
Elsipogtog First Nation	Millbrook First Nation	Sipekne'katik First Nation
Eskasoni First Nation	Oromocto First Nation	Tobique First Nation

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<sup>55</sup> Halifax Water and Accelerator Inc. "Corporate Structuring for Atlantic First Nations Water Authority." August 2017. P.15

## 6 Financial Analysis

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### 6.1 Operating and Capital Costs

AFNWA will require investment in operations and ongoing capital investment.

Operating forecasts incorporate initial startup costs to establish the AFNWA, and the anticipated long-term annual operation costs. Operating costs include salaries and benefits of the functional areas of corporate services, communications and public relations, operations and engineering, plus overall administration cost of the utility including boards costs. The additional core operating costs include the community-based operations and maintenance costs, and water quality testing programs.

Most capital costs are associated with water treatment, water distribution, wastewater treatment, and wastewater collection systems. Capital and operating costs have been presented for a 10-year (2022-2031) time frame in order to provide a comprehensive overview of the scope of investment that is required to establish AFNWA, and to ensure the provision of safe water and wastewater services. The operating and capital financials presented have been drawn from previous reports. Financial projections will be refined as the AFNWA establishes operations and completes their management and asset management planning. The financials presented provide estimates at the time of investigation but may not fully represent current conditions or address continued investment by the Atlantic First Nations communities.

It is anticipated that capital budgets will be approved annually, however, establishing a 10-year capital plan will establish medium-term capital requirements. A long-term funding arrangement and budget will be required to provide AFNWA with ongoing financial stability and to more firmly establish the authority. In this regard, as referenced in the Corporate Structure and preliminary Five-Year Business Plan, an Integrated Resource Plan (IRP) will be developed after the first three years of operation and be revised every five years thereafter. The IRP will consider the infrastructure needs over a 25 to 30-year period within the strategic drivers of:

- asset renewal
- regulatory compliance
- facilitation of growth

This latter strategic driver is very important to First Nations where their population is projected to grow as economic opportunities are realized. Establishing this 25 to 30-year perspective will ensure there is a holistic and strategic view of required and potential capital investments. Refer to Appendix 7 and 8 for the 2022-2046 summary operating and capital budget projections associated with participating Atlantic First Nation communities

#### 6.1.1 Maintenance and Asset Deficiencies

A core role of the new AFNWA will be to provide an efficient continuity of operation and maintenance within each community system. In addition, AFNWA will be required to address system deficiencies that have been the result of a lack of prescribed maintenance, not including other factors such as warranty defects or force majeure. AFNWA will be required to implement corrective action, such as maintenance, repairs or renewal, in order to satisfy the required level of

service, and meet an identified regulatory requirement. A deferred maintenance program will need to be implemented in order to arrest continued depreciation of the assets.

AFNWA will own and manage the community water and wastewater assets from all Atlantic First Nation communities who have signed formal BCR's to join the AFNWA.

As each Atlantic First Nation communities have historically operated independently there will be a variation in the design, construction, operation and maintenance standards, and monitoring that has been instituted in each water and wastewater system. It is anticipated that AFNWA will need to identify the cost benefit of operating each system, identify which assets can be improved, or require replacement.

An early task will be to develop consistent standards driven by industry best practice and regulatory requirements. An asset management plan (AMP) will be developed by the AFNWA and should include an assessment of the condition of each community's assets with a plan for achieving and maintaining future regulatory compliance.<sup>56</sup> Considerations of asset type, condition and operating standards of the infrastructure will be important prior to significant capital upgrades being completed. With this assessment rationalized and incorporated into the AMP, future investment will inform AFNWA as to whether standardization of assets, continued operation of discrete systems, or abandonment of existing assets in lieu of new investments is required.

As referenced above, an IRP incorporates requirements over a 25 to 30-year period for three strategic drivers: asset renewal, growth, and regulatory compliance. Supporting the AMP, the IRP investigates customer growth potential, demand projections of the utility, the capability to meet customer service needs, and the development of emergency response planning.

## 6.2 Financial Performance

Projected AFNWA financials have been amalgamated from key assessments and previous reports. Sourced data include the anticipated operating and capital costs associated with establishing the AFNWA structure and the ongoing capital expenses that will be required to address capital deficiencies for participating Atlantic First Nation communities.

Based on a 2017 Halifax Water report, Table 15 identifies the operating costs associated with the four management structures considered to accommodate the current 15 Atlantic First Nation communities (as discussed in detail in Appendix 6).<sup>57</sup> These management structures introduce an important baseline which has the scalability to accommodate future participation by other Atlantic First Nations communities. While these additional costs may be required to incorporate additional hubs, operators etc., the foundation of operating expenses, identified in 2017 dollars are identified below. While 2017 dollars were utilized based on the Halifax Water report, a 2022 financial summary was conducted to further refine and project the long-term funding need. Figures provided in Table 15 also encompass recommendations (for Full Service Decentralized option

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<sup>57</sup> Halifax Water and Accelerator Inc. "Corporate Structuring for Atlantic First Nations Water Authority." 2017 Appendix J.

only) from the Ontario Clean Water Agency (OCWA) Review<sup>58</sup> of January 2021. For additional details refer to Appendix 7.

Table 15 Management Structure Operating Expense Comparison<sup>59</sup>

<i>Operating Expenses</i>	<i>Full Service Centralized</i>	<i>Full Service-Decentralized</i>	<i>Full Outsource</i>	<i>Technical Services Support</i>	<i>Current State</i>
<b>AFNWA Structure</b>					
Administration	1,119,183	1,096,915	742,153	1,001,782	
Corporate Services Department	823,918	823,918	366,854	823,918	
Communications Department	270,630	270,630	198,462	270,630	
Operations Department	1,732,032	1,830,074	529,232	1,160,702	
Engineering Department	517,204	517,204		517,204	
<b>Corporate Structure (Operating) Sub Total</b>	<b>4,462,967</b>	<b>4,538,741</b>	<b>1,836,701</b>	<b>2,774,236</b>	<b>4,012,206</b>
<b>AFNWA Board Costs</b>	250,000	250,000	250,000	250,000	250,000
Community Systems O&M plus MTA Costs	3,200,000	3,200,000	3,200,000	3,200,000	3,200,000
Testing Program	3,000,000	3,000,000	3,000,000	3,000,000	3,000,000
<b>Operating Total</b>	<b>10,912,967</b>	<b>10,988,741</b>	<b>10,224,236</b>	<b>10,224,236</b>	<b>10,462,206</b>

Note 1) Full Outsource integrates Operations and Engineering

Note 2) Current State financials have been extracted from the Ulnooweg Financial Analysis for the 15 participating communities

Note 2) Ongoing operating costs have been assumed which does not include the \$1.5M one-time startup costs

Note 3) Board and other costs identified in the lower section of the table would not fully apply to current state but have been applied to provide a comparison

A projected 25-year (2022-2046) cash flow which has incorporated inflation and depreciation, AFNWA operating and capital expenses, and projected ISC community funding (Table 16 and Appendix 7) has been developed for participating Atlantic First Nations communities with BCRs (Table 8). These factors have been incorporated to ensure proper financial projections are integrated within the model (refer to 6.3 Financial Assumptions) and to ensure alignment to anticipated financial needs.

<sup>58</sup> Ontario Clean Water Agency (OCWA). "Atlantic First Nations Water Authority – Review and Recommendations on the Business Case." January 12, 2021.

<sup>59</sup> Ulnooweg Development Group Inc. "Ulnooweg Community Financial Analysis – Final Interim Report. 2018. P.13

Table 16 AFNWA Participating Atlantic First Nations Communities Projected Financial Expenses (\$) Years 1-10 (2023 – 2032) and Total Years (1-25)

Financial Year	Total Years 1-25	2022/23	2023/24	2024/25	2025/26	2026/27	2027/28	2028/29	2029/30	2030/31	2031/32
<b>Financial Summary</b>											
<b>Profit and Loss</b>											
Revenue - External Funding	110,629,012	3,086,386	3,148,282	3,211,248	3,275,473	3,340,982	3,407,985	3,476,145	3,545,668	3,616,581	3,689,111
Revenue - Operating	-	-	-	-	-	-	-	-	-	-	-
Cost of Sales	-	-	-	-	-	-	-	-	-	-	-
<b>Gross Margin</b>	<b>110,629,012</b>	<b>3,086,386</b>	<b>3,148,282</b>	<b>3,211,248</b>	<b>3,275,473</b>	<b>3,340,982</b>	<b>3,407,985</b>	<b>3,476,145</b>	<b>3,545,668</b>	<b>3,616,581</b>	<b>3,689,111</b>
<b>AFNWA structure</b>											
Admin Department	(38,040,157)	(1,187,400)	(1,211,213)	(1,235,437)	(1,260,146)	(1,285,349)	(1,311,126)	(1,337,349)	(1,364,096)	(1,391,378)	(1,419,281)
Corporate Services Department	(28,572,834)	(891,883)	(909,770)	(927,965)	(946,524)	(965,455)	(984,817)	(1,004,513)	(1,024,604)	(1,045,096)	(1,066,055)
Communications Department	(9,385,237)	(292,954)	(298,829)	(304,806)	(310,902)	(317,120)	(323,480)	(329,950)	(336,549)	(343,280)	(350,164)
Operations Department	(63,465,540)	(1,981,037)	(2,020,767)	(2,061,182)	(2,102,406)	(2,144,454)	(2,187,460)	(2,231,210)	(2,275,834)	(2,321,350)	(2,367,905)
Engineering Department	(17,936,232)	(559,868)	(571,096)	(582,518)	(594,169)	(606,052)	(618,206)	(630,570)	(643,182)	(656,045)	(669,202)
AFNWA Board costs	(8,669,805)	(270,623)	(276,050)	(281,571)	(287,202)	(292,946)	(298,821)	(304,798)	(310,894)	(317,112)	(323,471)
One Time Start Up Costs	(52,018,831)	(1,623,735)	(1,656,299)	(1,689,425)	(1,723,214)	(1,757,678)	(1,792,928)	(1,828,786)	(1,865,362)	(1,902,669)	(1,940,827)
Community Systems O&M plus MTA costs	(110,973,506)	(3,463,969)	(3,533,438)	(3,604,107)	(3,676,189)	(3,749,713)	(3,824,913)	(3,901,411)	(3,979,439)	(4,059,028)	(4,140,431)
Testing program	(104,037,662)	(3,247,471)	(3,312,598)	(3,378,850)	(3,446,427)	(3,515,356)	(3,585,856)	(3,657,573)	(3,730,724)	(3,805,339)	(3,881,654)
Integrated Resource Plan	(8,155,835)	-	-	-	(3,000,000)	-	-	-	-	(1,104,140)	-
<>	-	-	-	-	-	-	-	-	-	-	-
<>	-	-	-	-	-	-	-	-	-	-	-
Total operating expenses	(441,255,639)	(13,518,941)	(13,790,061)	(14,065,862)	(17,347,179)	(14,634,123)	(14,927,607)	(15,226,159)	(15,530,682)	(16,945,436)	(16,158,990)
<b>EBITDA</b>	<b>(330,626,626)</b>	<b>(10,432,556)</b>	<b>(10,641,778)</b>	<b>(10,854,614)</b>	<b>(14,071,706)</b>	<b>(11,293,140)</b>	<b>(11,519,622)</b>	<b>(11,750,014)</b>	<b>(11,985,015)</b>	<b>(13,328,855)</b>	<b>(12,469,879)</b>
Depreciation and Amortization	(54,396,722)	-	(179,495)	(358,941)	(612,531)	(866,151)	(1,119,908)	(1,373,926)	(1,601,451)	(1,829,438)	(2,057,986)
<b>EBIT</b>	<b>(385,023,348)</b>	<b>(10,432,556)</b>	<b>(10,821,274)</b>	<b>(11,213,555)</b>	<b>(14,684,238)</b>	<b>(12,159,291)</b>	<b>(12,639,530)</b>	<b>(13,123,941)</b>	<b>(13,586,465)</b>	<b>(15,158,293)</b>	<b>(14,527,865)</b>
<b>Operating Profit / (Loss)</b>	<b>(385,023,348)</b>	<b>(10,432,556)</b>	<b>(10,821,274)</b>	<b>(11,213,555)</b>	<b>(14,684,238)</b>	<b>(12,159,291)</b>	<b>(12,639,530)</b>	<b>(13,123,941)</b>	<b>(13,586,465)</b>	<b>(15,158,293)</b>	<b>(14,527,865)</b>
<b>Cash Flow</b>											
EBITDA	(330,626,626)	(10,432,556)	(10,641,778)	(10,854,614)	(14,071,706)	(11,293,140)	(11,519,622)	(11,750,014)	(11,985,015)	(13,328,855)	(12,469,879)
<b>Capital Expenditure - Participating Communities</b>											
Water Treatment	(4,402,576)	(415,460)	(423,792)	(864,535)	(881,826)	(899,462)	(917,501)	-	-	-	-
Water Distribution	(4,230,544)	(189,544)	(193,345)	(394,424)	(402,313)	(410,359)	(418,589)	(426,961)	(435,500)	(444,210)	(453,118)
Wastewater Collection	(20,421,860)	(914,975)	(933,325)	(1,903,982)	(1,942,062)	(1,980,903)	(2,020,630)	(2,061,042)	(2,102,263)	(2,144,308)	(2,187,312)
Wastewater Treatment	(23,392,422)	(1,048,067)	(1,069,086)	(2,180,935)	(2,224,554)	(2,269,045)	(2,314,550)	(2,360,841)	(2,408,058)	(2,456,219)	(2,505,478)
Total capital expenditure	(52,447,402)	(2,568,046)	(2,619,548)	(5,343,877)	(5,450,754)	(5,559,770)	(5,671,270)	(4,848,844)	(4,945,821)	(5,044,737)	(5,145,909)
<b>Lifecycle Capital Maintenance Expenditure - Participating Communities</b>											
Annual Asset Renewal	(171,444,010)	(5,412,452)	(5,520,997)	(5,631,417)	(5,744,045)	(5,858,926)	(5,976,426)	(6,095,954)	(6,217,874)	(6,342,231)	(6,469,423)
Total	(171,444,010)	(5,412,452)	(5,520,997)	(5,631,417)	(5,744,045)	(5,858,926)	(5,976,426)	(6,095,954)	(6,217,874)	(6,342,231)	(6,469,423)
<b>Net Cash Flow</b>	<b>(554,518,037)</b>	<b>(18,413,053)</b>	<b>(18,782,323)</b>	<b>(21,829,908)</b>	<b>(25,266,506)</b>	<b>(22,711,836)</b>	<b>(23,167,317)</b>	<b>(22,694,813)</b>	<b>(23,148,709)</b>	<b>(24,715,823)</b>	<b>(24,085,211)</b>
<b>Cash Account</b>											
Cash Balance b/f		11,751,966	(6,661,087)	(25,443,410)	(47,273,318)	(72,539,824)	(95,251,660)	(118,418,978)	(141,113,791)	(164,262,500)	(188,978,323)
Net Cash Flow		(18,413,053)	(18,782,323)	(21,829,908)	(25,266,506)	(22,711,836)	(23,167,317)	(22,694,813)	(23,148,709)	(24,715,823)	(24,085,211)
Cash Balance c/f		(6,661,087)	(25,443,410)	(47,273,318)	(72,539,824)	(95,251,660)	(118,418,978)	(141,113,791)	(164,262,500)	(188,978,323)	(213,063,534)

Key elements of the operating costs include the formation of the AFNWA structure to establish administrative, corporate services, communications and public relations, operations, and engineering<sup>60</sup>.

The costs identified in the Table 16 do not include impacts from GUDI for water treatment costs. Further hydrogeological assessments over a period of one to two years would be required to quantify additional costs. Table 16 does include additional costs for wastewater treatment beyond the minimum national performance standard of secondary treatment, which is further clarified in Table 17 below. Adding this additional cost / contingency is based on Halifax Water's experience as they own and operate 14 wastewater treatment plants with 9 discharging to inland receiving waters. These nine plants have treatment technologies ranging from enhanced secondary to tertiary with increased capital costs approximately double that for secondary treatment.

*Table 17 – GUDI Impact on Participating Communities Wastewater Treatment Costs*

Participating Community	CBCL Table 11.1 2018 Wastewater Treatment Costs	Revised CBCL Table 11.1 2018 Wastewater Treatment Costs
Abegweit	-	-
Acadia	-	-
Eel River Bar	-	-
Elsipogtog	5,100,000	7,650,000
Eskasoni	4,350,000	6,525,000
Glooscap	-	-
Lennox Island	675,000	1,012,500
Membertou	-	-
Millbrook	-	-
Oromocto*	-	-
Paqtnkek Mi'kmaw	2,437,500	3,656,250
Pictou Landing	435,000	652,500
Potlotek	1,102,500	1,653,750
Sipekne'katik Indian Brook	232,500	348,750
Tobique	2,400,000	3,600,000
<b>Total</b>	<b>16,732,500</b>	<b>25,098,750</b>

\* Oromocto was not included within the CBCL report.

\*\*Costs reflect capital expenses input which are escalated for incorporation within the financial analysis (Refer to Table 20 Assumption 5)

<sup>60</sup> Halifax Water and Accelerator Inc. "Corporate Structuring for Atlantic First Nations Water Authority." 2017 Appendix J.

The cost per household for the provision of water and wastewater services compared to the current state of funding is provided in Table 18. It is anticipated that as additional Atlantic First Nations communities agree to participate with AFNWA, that the average cost per household will decrease as the operational costs will be further shared.

*Table 18 Cost per household of current state versus AFNWA*

Participating Communities	Operating Cost (\$) Per Household
Current State (15 communities)	\$ 907
Adjusted Current state (15 communities)	\$ 2,364
AFNWA (15 communities)	\$ 2,497

Current state costs for 2017 as compiled by Ulnooweg do not include corporate services, communications and public relations, operations and engineering. It is also anticipated that ongoing operating costs will be required to support AFNWA board costs, community-based operations and maintenance costs, and testing programs. If these costs are applied to the Ulnooweg costs to give a basis of comparison this results in a **\$2,364** cost per household. This cost per household is comparable with the AFNWA costs of **\$2,497**.

### 6.3 Financial Assumptions

The following assumptions (Table 19 and 20) have been made in the development of the financial analysis and associated financial performance.

*Table 19 – Assumptions Utilized in the Financial Analysis*

Assumption
1. Purpose of the AFNWA business case, and the associated financial analysis is to identify a preferred solution, and to identify an order of costs. Additional investigation will be required to articulate a more refined capital budget request. Detailed budget recommendation will be provided separately.
2. Financial projections indicate a high-level estimate based on research conducted to date, and at various points in time. Financial numbers are indicative of the potential need.
3. Responsibility to identify and validate capital investment priorities will rest with the AFNWA. Capital project budgets will primarily identify initial considerations (years 1-2), with future years (3-10) showing an anticipated magnitude of investment.
4. The financial projections from previous reports identify the investment required to establish minimal levels of service and comply with current regulatory standards.
5. A 10-year capital and operating budget window will enable AFNWA to meet current regulatory standards
6. The proposed financial performance and funding model will be refined with the completion of the AFNWA AMP and IRP.
7. The initial AMP will be completed within the 2-3 years operational / start up period.
8. Outsourcing project management expertise will provide AFNWA with the ability to aggressively address capital needs while allowing AFNWA to develop operational capacity

## Assumption

9. The 10-year capital plan identifies a total capital need for the Atlantic First Nations communities. Specific cash flows, and prioritized projects may be modified based on service needs
10. Utilities will operate in accordance with best practice develop long-term integrated resource plans (IRP) that our updated on a regular cycle (typically every five years).<sup>61</sup>
11. Establishing the AFNWA will require the transfer and accumulation of community water and wastewater assets.
12. The financial value of the assets has been identified through the work of CBCL however this does not presume to identify the remaining useful life. This will be identified during the development of an Asset Management Plan.
13. Deferred maintenance costs have not been identified as part of the financial expenses. The Asset Management Plan will determine a full costing and determine remaining useful life.
14. Financing costs have not been assumed as part of the financial model as it is anticipated Government of Canada funding will match the identified funding request.
15. No capital allowances have been provided to accommodate future studies (i.e. GUDI studies) which may identify requirements for additional capital expenses. Due to the lack of information these speculative costs have not been incorporated into the financial analysis.
16. Depreciation has been calculated based on the following projected lifecycle projections: water treatment 50 years, water distribution 75 years, wastewater treatment 40 years, and water collection 60 years.
17. Inflation (at 2%) has been incorporated within the project operating and capital budget.
18. Cost of sales which incorporates costs for sourcing and processing water has been incorporated within the AFNWA Operations costs.
19. Wastewater treatment costs have been grossed up by 50% in recognition that most of the First Nation communities live near inland waterways and will require wastewater effluent treatment beyond secondary levels. Refer to Table 17 for additional clarification.

Estimates for the capital costs to bring infrastructure up to a good state of repair have been sourced from the APC – First Nation Asset Condition Assessments, CBCL Report (2018) and CBCL Memo (2021).<sup>62</sup> That report provides detailed accounts of investigations including in some cases statements of assumptions in development of needs and costs. The detailed information including assumptions in the report is fundamental to the resulting Class C cost estimates. Table 20 recounts some of the more general assumptions in the report.

<sup>61</sup> The Integrated Resource Plan (IRP) is a comprehensive road map for meeting the AFNWA's objective of providing reliable and efficient water and wastewater service to all customers/communities over a 25 to 30-year period.

<sup>62</sup> CBCL. "AFNWA Business Case Reconciliation, AFNWA Gap Analysis - Rev 1." March 5, 2021.

Table 20 – Assumptions in APC – First Nation Asset Condition Assessments, CBCL Report

Assumption
1. Information on systems and conditions may not have been available and not all communities were visited. The report states assumptions were made based on experience and professional judgement to compensate for the incomplete information/documentation;
2. Class C cost opinions are presented in source reports. The Public Service and Procurement Canada (previously referred to as Public Works and Government Services Canada) definition of Class C estimates includes “based on a comprehensive list of requirements and assumptions, including a full description of the preferred schematic design option, construction/design experience, and market conditions”;
3. In some instances, only cost estimates for studies and investigations needed to establish needs are included. Completion of those studies and investigations may identify new needs/costs;
4. For linear wastewater collection assets and in the absence of inspection reports, age and evidence of inflow and infiltration (I/I) were used to advise on a % of system replacement need and associated capital allowance. Inspections of linear assets such as CCTV inspections of pipes to identify condition and I/I sources will be important to confirming needs/costs and strategies to address needs;
5. Needs assessments focused on existing infrastructure. The report notes two important risks which may result in new infrastructure needs and costs – determination of well water sources under the influence of surface activities (GUDI) and wastewater receiving waters being adversely impacted by existing effluent discharge. For several communities, capital costs are included for studies and the results of those studies may identify new needs/costs.
6. The report notes the absence of agreed standards against which to assess needs. The report clearly states the standards utilized in the assessments. Establishment of standards under the AFNWA may change the assessments of needs and costs;

### 6.3.1 Required Capital Investments

The above estimates include capital investment projections for continued asset renewal (\$5 million per year (2018 dollars) and upgrades in four main categories: water treatment, water distribution, wastewater treatment, and wastewater collection. Table 21 provides an overview of the estimated capital investments.

Table 21 Capital cost projections

	Total Years 1-10 (2022/23 – 2031/32)	Total Years 11-25 (2032/33 – 2046/47)
Annual Asset Renewal	\$59,269,745	\$112,174,264
Capital expenses - water upgrades	\$8,170,939	\$462,181
Capital expenses – wastewater upgrades	\$39,027,635	\$4,786,646
<b>Total Capital Expenditure</b>	<b>\$106,468,319</b>	<b>\$117,423,091</b>

The costs identified in Table 21 are only an assessment of expected costs based upon the information currently available as of January 2021. The capital requirements, particularly for the

longer term (11-25 years), will be revised during the development of the 10-year Capital Spending plan informed by an Asset Management Plan and the Integrated Resource Plan<sup>63</sup>. Additional costs related to integrated resource planning, IT investments, corporate equipment and fleet will also be required. The capital plan will prioritize investments with consideration for the following:

- Address existing deficiencies
  - o Repair aging water distribution and wastewater collection systems
  - o Repair critical water and wastewater treatment infrastructure
  - o Reduce risk through bulk purchasing and multi-community contract management
  - o Replace existing equipment to limit additional maintenance requirements
  - o Construct common Supervisory Control and Data Acquisition System [SCADA]
- Asset renewal
  - o On-going rehabilitation or renewal of systems or components based on life cycle analysis. Maintain state of good repair to achieve desired Level of Service.
- Build system resiliency
  - o Invest to provide and / or improve backup power
  - o Improve building and system security to protect assets
  - o Construct new backup systems where feasible
  - o Implement water loss control program within water distribution system
  - o Implement Inflow and Infiltration Reduction program within wastewater collection
  - o Continue previous investment
  - o Retain consultants to phase in or advance future work
  - o Complete preliminary design studies that identify plant expansion needs and upgrades
  - o Pursue partner studies with each MTA community to identify timing of possible investment from partner communities to the Atlantic First Nation community

While the intent of the AFNWA business case is primarily focused on confirming the AFNWA opportunity, understanding the financial requirements is critical. Previous financial analyses conducted between 2009 and 2018, varied in scope, approach, and recommendations. As part of this Business Case, a detailed review and analysis was conducted to determine the financial investments required to establish the AFNWA. Capital costs for participating AFNWA communities were sourced from individual community assessments,<sup>64</sup> cash flow according to their water and wastewater risk summaries<sup>65</sup> and reconciliation of ISC provided data on capital investments between 2017-2021 and those funded through 2021-2022.<sup>66</sup> Appendix 8 provides investment requirements by community. While this information provided a general understanding of the financial need and potential timing for the investment, it is anticipated that prioritization will formally occur as AFNWA completes their AMP and IRP.

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<sup>64</sup> Halifax Water Business Plan referenced CBCL reports as source of capital investments.

<sup>65</sup> Capital costs include design and construction contingencies and include potential contractor general conditions and markup.

<sup>66</sup> CBCL. "AFNWA Business Case Reconciliation, AFNWA Gap Analysis - Rev 1." March 5, 2021.

### 6.3.2 Recent ISC Capital Investments

ISC’s long term commitment to provide funding to Atlantic First Nations communities requires a specific mention. ISC’s recent investment in capital from 2017 up to 2021-2022 has been provided and integrated into the financial analysis in this Business Case (section 6.3.1, Table 16, and Table 21). While specific investment details are not available at the time of this publication, CBCL has conducted a reconciliation of ISC 2018-2021 investments against capital requirements identified in 2018. Refined capital cost requirements were developed by CBCL by cross-referencing projects completed and those planned up to the end of FY 2021-2022.<sup>67</sup> These investments by ISC enables AFNWA to begin its operations in FY 2022-2023 with lower future capital requirements, particularly for water treatment and water distribution. Table 21 highlights examples of the types of investments ISC has recently undertaken.

*Table 22 – ISC 2017 – 2019 Capital Investments in Participating Communities*

Participating Community	Water Treatment	Water Distribution	Wastewater Collection
Elsipogtog	Upgraded SCADA, Iron Manganese treatments, Wellhead analytics, GUDI assessments, Contingency	Fire hydrant, repairs / replacement, Leak detection program, Contingency	Manhole replacement, Pumping station upgrade, Collection piping replacement, Contingency
Tobique	Connect second well, Wellhead flow monitoring, Well level, temperature, conductivity monitoring, Iron and manganese treatment, UV disinfection system, Chlorination upgrades, Online analytical instruments, Backup power New TWP building, SCADA Contingency	Dedicated transmission line, PRV building, reconstruction SCADA	Manhole replacement, Pumping station upgrade, SCADA, Contingency
Eskasoni	Develop new well, GUDI assessments, UV disinfection, Spencer line chlorine contact, Instrumentation		
Pictou Landing	Iron manganese treatments		
Potlotek	New building, New treatment process, New low/high lift pump, New SCADA system, Contingency		
Sipekne’katik	Drill, test, develop and commission new production well		

More detailed projections will be developed through the development of the AMP and IRP.

<sup>67</sup> Ibid.

## 6.4 Funding Sources

### 6.4.1 Indigenous Services Canada

Historically, Atlantic First Nation communities received funding directly from Indigenous Services Canada which was estimated to address 80% of the community’s water and wastewater service needs, With the establishment of the AFNWA a new funding model will be implemented which will redirect the ISC funding directly to the water authority as opposed to being received by the First Nations communities. According to a report<sup>68</sup> conducted in March 2018, the following table identifies funding received from Indigenous Services Canada. In December 2020, it was announced that First Nations will now receive 100% funding for operations and maintenance from the federal government.

*Table 23– ISC Atlantic First Nation Community Provided Funding*

First Nation Community	2018 ISC Funding	First Nation Community	2018 ISC Funding
Abegweit	\$146,020	Millbrook	\$42,594
Acadia	\$60,226	Oromocto	\$33,601
Eel River Bar	-	Paqtnkek	\$149,140
Elsipogtog	\$215,057	Pictou Landing	\$215,057
Eskasoni	\$461,046	Potlotek	\$193,933
Glooscap	\$29,583	Sipekne'katik	\$219,252
Lennox Island	\$292,322	Tobique	\$182,611
Membertou	-		

### 6.4.2 Potential Organizations with Funding Opportunities

Opportunities may exist for the AFNWA to Identify other organizations and potential funding opportunities. Tapping into multiple funding sources will reduce the dependency on any one organization or funding program which will allow the AFNWA to implement a dedicated, and sustainable funding model. Ongoing monitoring will be implemented in order to influence policy to facilitate the development of a sustainable funding source for AFNWA. Potential funding sources (Table 24) include but are not limited to the following:

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<sup>68</sup> Ulnooweg Development Group Inc. “Ulnooweg Community Financial Analysis – Final Interim Report. 2018.

Table 24 Potential Funding Sources

Potential Organizations with Funding Opportunities	Rationale / Funding Alignment
<b>Government of Canada</b>	
Indigenous Services Canada	<p>Provides funding for construction and upgrades (capital investment) and 80% of operating and maintenance expenses to First Nations for the provision of water services to their communities. Forms part of the block funding received by communities.</p> <p>Transfer water and wastewater based and top up funding from specific Atlantic First Nation communities to AFNWA</p> <p>Operating costs spent on water and wastewater testing may be eligible as part of the Water Monitors program or through the Department of Indigenous Services Canada</p>
Non-Aboriginal Funding Agreements	<p>In these circumstances the Government of Canada and a local town or municipality provides funding (or a funding agreement) that supports to provision, or assistance of water or wastewater services. An example would be through an MTA</p>
Long bond yields of the Government of Canada	<p>Securing long bond yields under Government of Canada rates, First Nations Finance Authority etc.</p>
First Nations & Inuit Health Branch of Indigenous Services Canada	<p>Responsible for the delivery of drinking water quality monitoring programs.</p>
Environment and Climate Change Canada	<p>Involved in source water protection through its powers to regulate the discharge of effluent.</p>
<b>Community Funding</b>	
Atlantic First Nation communities	<p>Existing funding received for water and wastewater services by Atlantic First Nations</p>
Business and industries	<p>As communities' benefit from securing water and wastewater service, economic development may follow suite. Development charges, and reallocated business tax may provide Atlantic First Nation communities, and AFNWA with another funding source</p>
AFNWA Own Source Revenues (OSR)	<p>Ability for AFNWA to redistribute revenues to address capital requirements.</p>
Philanthropy	<p>Provide positive impact to address specific needs</p>
AFNWA depreciation	<p>As assets are constructed by the AFNWA, financial plans may include depreciation as an operational expense and utilized to</p>

Potential Organizations with Funding Opportunities	Rationale / Funding Alignment
	develop a reserve which may act as a funding source for future capital investments. <sup>69</sup>

## 6.5 Future Financial Needs

While the current review has provided an analysis of previously completed business plans, asset condition assessments, financial analysis, and other assessments, it is anticipated more detailed information will be required to refine and identify future needs. As operations commence AFNWA will gain a greater understanding of the level of services being provided to Atlantic First Nation communities, the asset condition of water and wastewater systems, and the financial needs required for investment. With the completion of the AFNWA AMP and IMP, capital priorities, and funding sources will be confirmed enabling a more strategic understanding of financial need.

Once operational, the AFNWA can investigate alternatives including new technologies and, over time, reduce cost and/or risk. Improving capital forecasting to reconcile contracting capability to deliver projects may modify cash flow forecasting or require a modification to existing AFNWA operating capacities to address timelines. Capital estimates may be further refined due to AFNWA's ability be more cost-effective in pursuing multi-year construction activity, design and tendering or the delivery of services to multiple communities.

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<sup>69</sup> Halifax Water and Accelerator Inc. "Preliminary Fire Year Business Plan." June 2018. P.2

## 7 Management Strategy

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### 7.1 Governance Plan

#### **Establish AFNWA Corporate Governance**

Officially incorporated on 18 July 2018 under the Canada Not-for-profit Corporations Act, AFNWA will initiate formal governance with the allocation of funding from the federal government. The AFNWA will be governed by a Board of Directors, the majority of whom will be First Nations. The Board of Directors for the AFNWA will consist of up to 15 members with 12 representatives from First Nation communities and 3 technical experts. While the number of directors is larger than is typical for municipal boards of similar populations, this number reflects the complexity and geography associated with the diverse number of communities participating in the AFNWA. It is also representative of the oversight associated with the magnitude of the capital and operating funding request. The AFNWA Directors are elected by the owners, which are the communities. A Board of Directors is the senior level of management required by law to oversee the operations of the AFNWA. It is responsible for setting the strategic direction, high level oversight, risk management framework, and the body to whom the Chief Executive Officer (CEO) will report to. A Director Competency Matrix has been developed by the AFNWA to ensure the knowledge, skills and experience of each Director and the Board can efficiently fulfill the responsibilities they are required to complete. In addition, the Board will have the wise guidance of an Elders Council who help ensure that First Nations culture, values and traditions are embedded in the AFNWA.

Establishing the AFNWA will require the identification of the required management and operational staff and their roles and responsibilities prior to recruitment to establish a full staff compliment. With the Board implementation, and the AFNWA staff, the organization will be prepared to implement a management strategy to ensure the efficient delivery of water and wastewater services to participating Atlantic First Nations communities.

On May 29<sup>th</sup>, 2018, the Atlantic First Nations Chiefs selected the following first members to serve as the Board of Directors for the AFNWA<sup>70</sup>:

- Chief Leroy Denny, Eskasoni First Nation
- Chief Aaron Sock, Elsipogtog First Nation
- Chief Matilda Ramjattan, Lennox Island First Nation
- Chief Andrea Paul, Pictou Landing First Nation
- Chief Wilbert Marshall, Potlotek First Nation

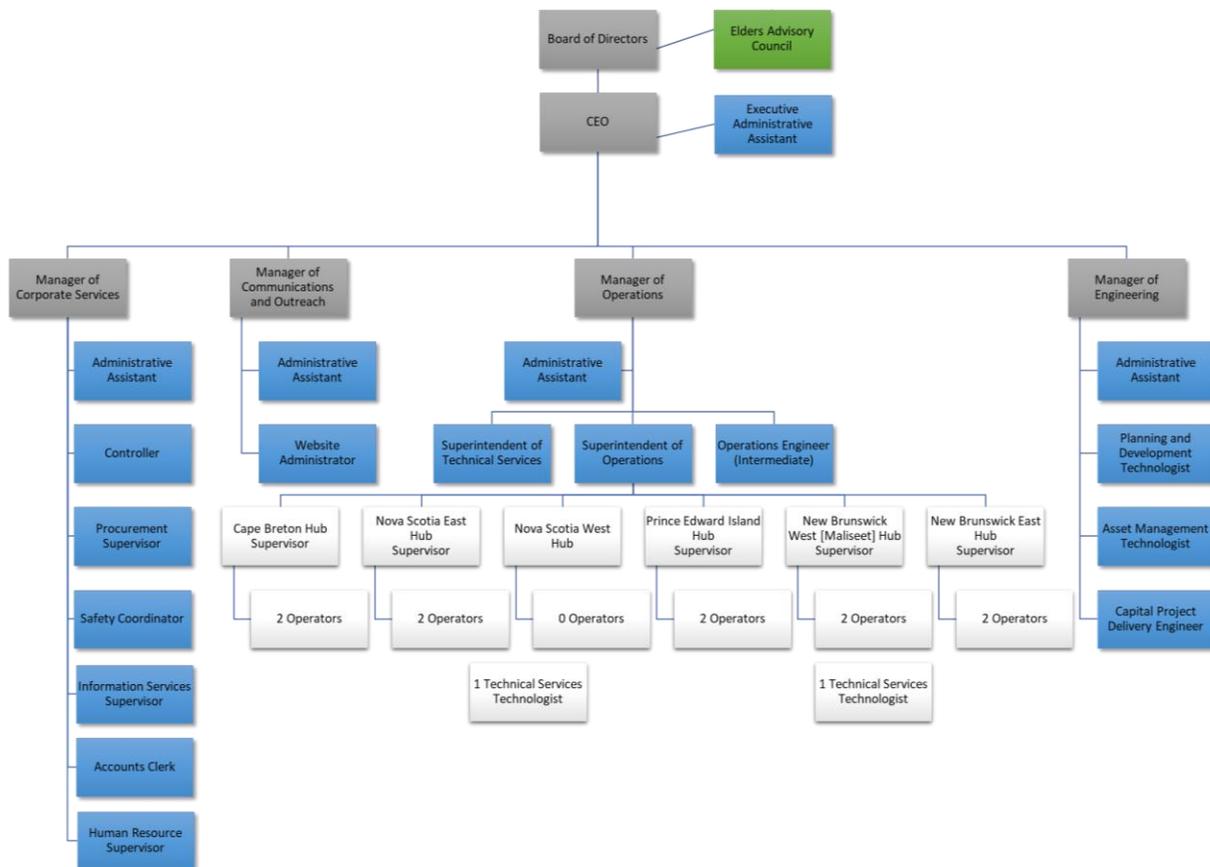
The AFNWA will establish a fully operationalized structure with a management team experienced in the operation of water and wastewater systems. Led by a qualified CEO, the management team will be responsible to coordinate qualified water and wastewater employees to deliver on the mission of the non-profit corporation.

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<sup>70</sup> AFNWA press release. "Atlantic Chiefs select first board members of the Atlantic First Nations Water Authority Inc." May 29, 2018.

The initial organizational chart is provided in Figure 5 complete with management, operations, and administrative staff<sup>71</sup>. As additional communities join the AFNWA, new communities will be assigned to hubs based on service considerations such as their geographic location, service demands for existing operations, and cultural considerations. Should capacity be limited to accommodate these new communities within the existing hubs, additional hubs and the required operators will be added. This scalability and flexibility are an inherent benefit of the hub and spoke / FSD management structure.

Figure 5 Governance and organizational chart for the AFNWA



The AFNWA will establish the precedent and pioneer the opportunity for this governance and service delivery model to be incorporated across Canada. AFNWA will also position itself as an important influencer in the development of future provincial and national regulations which will benefit all First Nations across Canada.

<sup>71</sup> The OCWA Report recommends one additional staff person in the role of Supervisor of Compliance. This has been adjusted in the financial model using the rate for a supervisor. Other additional costs may be reflected in the Business Plan as AFNWA compliance and training plans are developed.

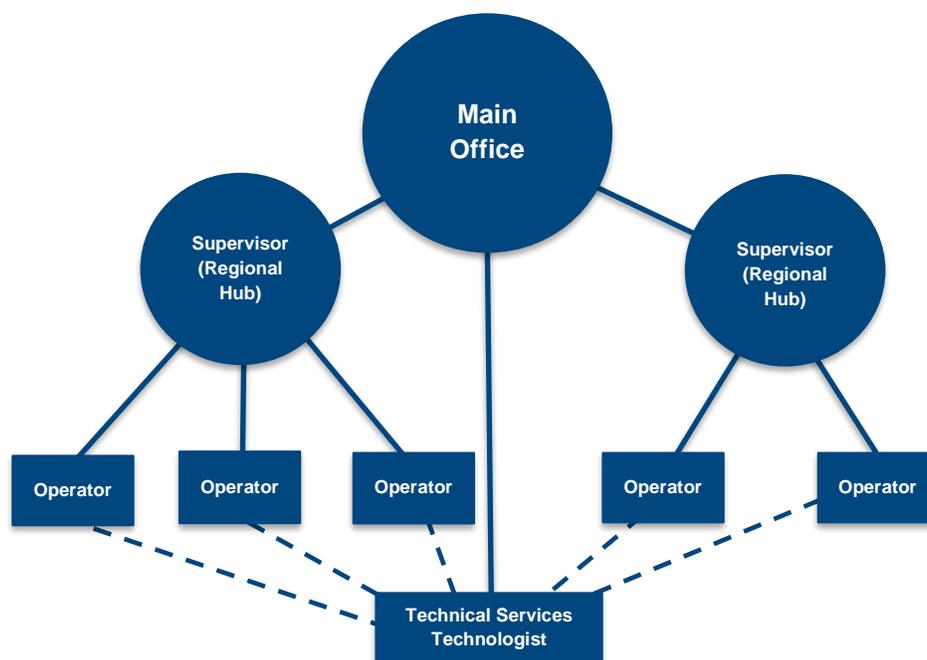
## 7.2 Operational Management

### 7.2.1 Operating as a 'Hub & Spoke'

The Full-Service Decentralized 'hub & spoke' organizational design is a model which arranges service delivery into a network consisting of one central anchor (hub) which offers an array of services with support from the main office. The main office (headquarters) would be located within the service corridor between Halifax and Moncton in an Atlantic First Nation community to maximize local benefits and strengthen relationships. Regional hub offices should also be located within Atlantic First nation communities to further maximize local benefits and strengthen relationships.

The intent of the hubs is to position expertise and operational knowledge in locations close to several communities. Regional hubs have been identified for Cape Breton, Nova Scotia East, Nova Scotia West, Prince Edward Island, New Brunswick West, and New Brunswick East. Regional hubs provide management and support for individual communities. They have been organized based on proximity of travel distance to ensure timely support and monitor costs by region.

*Figure 6 Hub & Spoke Relationship Diagram*



Utilizing a hub and spoke model will require the planning, organizing, and supervising of the regional hubs to ensure service delivery standards are being met. The following identifies key operational management activities of the main office:

- Managing staff performance and accountability
- Implementing training requirements and ensuring participation in associated training
- Scheduling to ensure operations are meeting regulatory requirements
- Alignment of operational duties with the goals of water and wastewater activities

- Conformance to organization processes
- Maintenance of records
- Establishment of operational procedure, metrics, and staff responsibilities
- Implementing performance reviews for staff
- Identification and reporting of key success measures

The secondary establishments (spokes) offer a more limited arrange of services which are focused on the delivery of water and wastewater services to the communities to which they are located. Embedding supervisors and operators allows for a direct connection to be developed with the community which allows them to become familiar with local operations. Furthermore, it allows local managers to become personally involved with the community. The following identifies the key activities of hub and associated spokes:

- Day to day operational decision making to address community needs
- Management of local resources and operational knowledge
- Creation of a sense of a common mission among local operators
- Responsibility for direct interaction with the community, customers and the opportunity to foster relationships

## 7.2.2 Scalability

While currently designed to accommodate 15 communities, the hub and spoke model is a highly scalable and efficient design which can be expanded to accommodate additional satellite communities, address growing or declining populations and changing (geographic) groupings of participating communities as BCR's are finalized.

As of March 2020, AFNWA recognizes the opportunity to formally expands its services to an additional eighteen Atlantic First Nations communities. The following table identifies the seven (7) communities who have expressed interest to participate, and the other eleven (11) potential communities.

*Table 25 Identified future AFNWA First Nation Communities*

<b>Atlantic First Nations Communities Expressing Interest</b>	<b>Potential Atlantic First Nations Communities</b>
Buctouche First Nation, NB	Burnt Church First Nation, NB
Indian Island First Nation, NB	Eel Ground First Nation, NB
Kingsclear First Nation, NB	Fort Folly First Nation, NB
Metepenagiag First Nation, NB	Madawaska Maliseet First Nation, NB
St Mary's First Nation, NB	Mushuau Innu First Nation, NL
Waycobah First Nation, NS	Pabineau First Nation, NB
Woodstock First Nation, NB	Annapolis Valley First Nation, NS
	Sheshatshiu Innu First Nation, NL
	Miawpukek First Nation, NL
	Wagmatcook First Nation, NS
	Bear River First Nation, NS

The current staffing levels identified to service fifteen (15) communities reflect an important baseline for the five departments to fully service the Atlantic First Nations communities. With this foundation AFNWA does not anticipate having a significant operational impact as new communities join (see Table 25). It should be noted that utility staffing for 22 communities were identified in the Corporate Structuring Report prepared by Halifax Water and Accelerator Inc. (August 2017) and at the time benefitted from a condition assessment carried out by CBCL in 2013. This condition assessment was further updated by CBCL in a report dated, April 2018. The staffing required for all 33 First nation communities reflects an estimate that has been undertaken without a condition assessment of assets associated with the 11 potential communities as noted in Table 25 above. Supported by additional maps in Appendix 9, Table 27 identifies the potential hub and spoke model should additional communities join the AFNWA. As these projections have been based on estimates, further modifications are possible as more detail information is obtained on asset condition and system attributes. For example, if significant capital projects are identified through a condition assessment, additional staffing will be required in the Engineering Department to deliver an enhanced capital budget. From an operational perspective, the different staffing requirements are indicated in Table 26<sup>72</sup> below

*Table 26 FSD Full Time Equivalent Requirements to Accommodate Future Community Interest*

AFNWA Department	15 Communities	22 Communities	33 Communities
Administration	2	2	2
Corporate Services	8	8	8
Communications	2	3	3
Operations <sup>73</sup>	20	22	28
Engineering	5	5	5
<b>Total</b>	<b>37</b>	<b>40</b>	<b>46</b>

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<sup>73</sup> This includes a Supervisor of Compliance as recommended in the OCWA Report review and is also included in the financial model.

Table 27 FSD Hub and Spoke Modification to Accommodate Future Community Interest

AFNWA Hub	15 Communities (6 hubs)	22 Communities (6 hubs)	33 Communities (7 Hubs)
Cape Breton	Eskasoni, Potlotek, Membertou	Eskasoni, Potlotek, Membertou, Waycobah	Eskasoni, Potlotek, Membertou, Waycobah, Wagmatcook
Prince Edward Island	Lennox Island, Abegweit	Lennox Island, Abegweit	Lennox Island, Abegweit, Fort Folly
New Brunswick West	Oromocto, Tobique	St. Mary's, Tobique, Kingsclear, Oromocto, Woodstock,	St. Mary's, Tobique, Kingsclear, Woodstock, Oromocto Madawaska
New Brunswick East	Eel River Bar, Elsipogtog	Eel River Bar, Elsipogtog, Bouctouche, Metepenagiag, Indian Island	Eel River Bar, Elsipogtog, Bouctouche, Metepenagiag, Indian Island, Pabineau, Burnt Church, Eel Ground
Nova Scotia East	Millbrook, Sipekne'katik, Paqtnkek, Pictou Landing	Millbrook, Sipekne'katik, Paqtnkek, Pictou Landing	Millbrook, Sipekne'katik, Paqtnkek, Pictou Landing
Nova Scotia West	Acadia, Glooscap	Acadia, Glooscap,	Acadia, Glooscap, Bear River, Annapolis Valley
Newfoundland and Labrador			MiawPukek, Mushuau, Sheshatshiu

AFNWA will continually reassess the organizational structure in order to maintain the identified level of service for Atlantic First Nations communities and to ensure efficiency in operations.

### 7.2.3 Risk Management

It will take several years to implement and develop the AFNWA to a fully functioning and mature organization. During this implementation several risks (identified in Appendix 10) must be managed, and risk response plans established for the highest risk events.

## 7.2.4 Regulatory Oversight

As the AFNWA will deliver essential public health and sanitation services, it is paramount that the operations be subject to regulatory oversight to ensure high quality drinking water and wastewater effluent. A federal regulatory body is recommended as First Nations communities fall under federal jurisdiction. Environment and Climate Change Canada currently regulates municipal wastewater systems through the federal Fisheries Act, and federal oversight would address the significant differences that exist between Atlantic Canada jurisdictions. While regulations have not been confirmed, in the interim, the AFNWA could adopt the regulations developed by the Centre for Water Resources Studies (CWRA) through Dr. Graham Gagnon for drinking water, and the federal wastewater system effluent regulations for wastewater.<sup>74</sup>

A regulator should be appointed to develop and govern business operations of the AFNWA. This federal regulator will be charged with the review and approval of business plans, capital budgets and integrated resources plans developed by the AFNWA. Additional responsibilities may include compliance and enforcement, and for reviewing and providing oversight on major capital expenditures that may be beyond the scope or expertise of the AFNWA. A similar regulatory role could be implemented to that established by the Nova Scotia Utility and Review Board in its oversight of utilities operating in Nova Scotia under the Public Utilities Act. The variation as it relates to the AFNWA is in how a federal regulator could modify its mandate to support the goals of First Nations self-governance while ensuring water and wastewater services are delivered with sound business principles for accountability and sustainability.

## 7.2.5 Medium- And Long-Term Operations

To sustain operations, a planned and managed investment will be required to reduce the risk across the AFNWA assets. Maturing or establishing capital plans, implementing a uniform operations and maintenance program, and human resourcing will ensure investments are directed towards priority capital projects, and key individuals charged with the responsibility for delivering the AFNWA services. Formalizing this work will enable AFNWA to provide the following actions for participating communities:

- Confirm and perform asset condition assessments for water and wastewater assets to close any knowledge gaps identified by previous studies
- Complete an Integrated Resource Plan (IRP)<sup>75</sup> to cover a 25-30-year period for infrastructure investment
- Develop Asset Management plans including system deficiencies, deferred and incomplete maintenance (within 2 years)
- Finalize capital budgets required to ensure all water and wastewater assets meet regulatory benchmarks / standards
- Conduct operating & maintenance assessments and implement continuous improvement reporting and operations

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<sup>75</sup> The IRP should be completed after approximately three years of operation and updated every five years thereafter, as noted in the preliminary Five-Year Business Plan approved by the AFNWA Board on July 11, 2018. The IRP will consider investments in the strategic areas of asset renewal, regulatory compliance and growth to meet expected levels of service.

- Advocate for regulatory benchmarks and appropriate funding program mechanisms to support Atlantic First Nation infrastructure investment

### 7.2.6 Continuous Improvement

Implementing a Full-Service – Decentralized model will require that AFNWA implement a continuous improvement program to ensure performance levels of water and wastewater services are achieving the AFNWA identified value for the community. Examples include the integration of ongoing water and wastewater quality testing to ensure alignment to regulatory standards, the integration of lessons learned from individual communities to inform other communities, and the regular review of organizational standards and policies. While initial stages of the project implementation will be largely focused on ensuring operations deliver a minimum level of performance required for water and wastewater services to align with anticipated regulatory standards, continued analysis will clarify future needs, and identify opportunities to maximize value for investments.

### 7.3 Asset Management

Identifying and prioritizing required investments in the participating Atlantic First Nation communities is a top priority for the AFNWA as operations commence. To support of this level of decision making AFNWA will develop an Asset Management Plan (AMP) in order to further confirm the current CBCL costs which is the best information currently available. The AMP will assist AFNWA in managing their infrastructure by identifying an agreed level of service to member communities, and prioritize projects which must be undertaken over time to match available funding. For the AFNWA, the AMP will consider a system-based approach where all assets are identified, technical and financial plans for each asset are created, and recommendations provided to ensure the most effective solution is implemented to provide a required level of service. Identifying the condition of these water and wastewater assets and prioritizing funding to correct deficiencies will be central to achieving regulatory compliance and keeping the systems in a state of good repair.

Many First Nations communities in Atlantic Canada already practice elements of asset management with systems to record information about water and wastewater assets, manage maintenance of infrastructure and make decisions on water and wastewater spending priorities. The AFNWA AMP will be periodically updated to identify changing conditions and to address potential risks. Examples include the depreciation of assets as they age which may impact utility funding and the associated financial adjustments which will to be made to account for these costs.

The Asset Management Plan will also assist in creating a ten-year pro-forma capital budget as it is anticipated to include all the infrastructure upgrade projects required to bring systems into compliance with benchmark regulations including funding for asset renewal.

There are cases in some communities where deferred maintenance has accumulated to the point where systems require complete replacement in order to maintain function. Previous reports point towards increasing gaps in asset performance due to a lack of continued infrastructure investment. This represents both a risk and an opportunity for the AFNWA:

- Capital needs have been established against a robust set of regulatory benchmarks however those have not been confirmed by the AFNWA. Possible adjustments to the regulatory benchmarks represent a risk if additional capital is needed to meet a new set of regulatory benchmarks.
- For systems where complete or significant replacement is anticipated, there will be an opportunity to consider replacement of existing technologies with current best practice technologies and management methods for servicing the small / low density populations in some of the participating communities. (Applying life cycle analysis to existing assets may even advise early decommissioning and replacement with technologies with lower O&M and therefore life cycle costs).

There are cases in some communities where background reports note additional studies will be required to identify if a higher level of treatment of drinking water or wastewater effluent is required to reduce risk to acceptable levels. In those cases, background reports do not provide a technical analysis or the possible cost of a higher level of treatment:

- For provision of drinking water, background reports recount that some well based sources currently with minimal treatment have not been confirmed to be “non-GUDI”. While background reports and the financial assessment include some capital allowances for GUDI studies, technical estimates for additional treatment which may be required to address risk have not been provided in background reporting or included in the financial assessment.
- For disposal of treated wastewater effluent, background reports recount that some treatment processes discharging to inland waters may be placing stress on the receiving water and a higher level of treatment may be required. Estimates for additional treatment which may be required to address risk have not been provided in background reporting or included in the condition assessment by CBCL (2018).
- The capital costs for wastewater treatment projected by CBCL Ltd. were based on compliance with the federal municipal wastewater effluent regulations (WSER) which stipulate a minimum national performance standard of secondary treatment. Based on the experience of Halifax Water, environmental risk assessments for recent capital projects have stipulated that treatment plants discharging to inland waterways (brooks, rivers and lakes) need to be designed to enhanced secondary or tertiary levels. Accordingly, wastewater treatment costs have been grossed up by 50% in recognition that most of the First Nation communities live near inland waterways and will require wastewater effluent treatment beyond secondary levels. For clarity and increased transparency Table 17 compares the CBCL Table 11.1 wastewater treatment costs, the revised table inclusive of the increase contingency and the costs identified for the specific / applicable plants.

Asset management training and guidance has been available to First Nations communities in Atlantic Canada. Recently the new Asset Management Program was introduced in fiscal year 2018-2019 to help First Nations develop capacity for long-term infrastructure construction and maintenance planning. This program is an initiative under Indigenous Services Canada's (ISC) Capital Facilities and Maintenance Program. The AFNWA may be able to take advantage of training and funding to support asset management activities.

To support asset management:

- AFNWA can develop an Asset Management Policy. The policy will outline AFNWA's commitments to corporate asset management planning and key principles such as service delivery standards, health and environmental protection standards and a lifecycle approach to decision making.
- AFNWA can integrate asset management strategies into the IRP: The strategies will outline the approach the AFNWA will use to achieve organizational objectives for water and wastewater systems through asset management practices including how risk will be incorporated into decision making (for instance, stating that prioritized projects will be where risk reduction potential per dollar is highest).
- The IRP can complement the AMP with the identification of infrastructure master plans for the various water and wastewater systems

Developing an asset management approach and principles to investment will enable AFNWA to address the following key challenges for the AFNWA:

- Establishing service levels in consideration of the type and condition of existing assets / levels of service and how to bring all communities to either the same service level or acceptable service levels.
- How to bring a large stock of existing infrastructure up to a state of good repair including opportunities with new technologies and moving towards standardization of infrastructure components.
- How to capture the existing life cycle status of a large stock of infrastructure and consider beneficial life cycle investments or, perhaps, "plan to fail" strategies which reduce spending which will not extend the life cycle of the asset.
- Bring some focus to non-infrastructure solutions such as supply and demand management, operations flexibility and staff training with a goal to optimize life cycle and possibly defer major capital spending; and
- Discuss procurement methods for the new AFNWA with some focus on value over the life cycle of the new infrastructure.

## 8 Implementation Strategy

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### 8.1 Governance and Oversight

The process to establish this permanent, independent water authority requires a staged approach to ensure cultural support, and a level of service which shows value to the Atlantic First Nations communities who are participating.

The following identifies key stages that are required for full implementation of the AFNWA.

#### 8.1.1 Phase 1: Approval & Funding

This enabling phase commences with the GOC approving the business case, the associated transition proposal and committing to providing funding to the AFNWA for a two-year transition period (2020-2022). This commitment will allow the following steps to commence.

##### **Interim Funding Approval**

The development of the AFNWA business case will present the Government of Canada with a formal funding request. In anticipation of a funding approval process, interim funding is recommended in 2020 to enable the AFNWA to transition to a functioning utility in the spring of 2022. Interim funding will enable the AFNWA to establish the legal and human resources functions immediately. This interim period will further enable continued conversations with Atlantic First Nation communities to solicit participation.

##### **Funding**

Further commitment by Government of Canada (GOC) will be required to provide long term funding to AFNWA in line with the order of cost identified in this Business Case. Noting that long term funding will come with final negotiation at the end of this two-year transition. Successful funding and signature of the Framework Agreement will close this step.

##### **Band Council Resolutions:**

The commitment to GOC funding will allow BCRs to be completed with participating First Nations Bands. This deliverable will require the AFNWA interim COO to travel to participating and non-participating First Nations alike to request a BCR for further commitment to the project. This will allow license and asset transfer agreements to be developed. This step is dependent on the signature of the proposed Framework Agreement before the community visits commence.

##### **Implement Human Resources Strategy and AFNWA Management Structure**

As interim funding is received, AFNWA will be able to implement a human resource strategy to establish the AFNWA management structure. This Human Resource strategy will recognize the experience and knowledge of staff currently employed in the community water and wastewater system operations and take a consistent approach to salaries, benefits, training, and career

development that is competitive with the municipal sector<sup>76</sup>. Hiring key senior leadership is required to establish the direction and develop detailed operating and capital requirements.

The goal is to hire all staff by April 2022 (one year after funding approval) with a clear preference to hire from participating Atlantic First Nations. The strategy involves the following activities:

- Contract with a professional search organization
- Hire the CEO and senior managers by April 1, 2021 to ensure top talent is retained.
- Initiate review and accountability of policy implementation, regular reporting and measurement
- Initiate and schedule regular Board meetings
- Hire and commence training of superintendents, technical services staff and operators
- Develop a formal training and development program for all staff employed by the AFNWA
- Hire and-or transfer local operators from the communities to the AFNWA wherever possible.
- Develop an operator training and certification program to commence once the assets and human resources are transferred to the AFNWA.

Hiring a full complement of staff is not anticipated at this point. Instead, a full complement of staff will be transitioned seamlessly on the required need. These following manager positions will have to be selected in order of priority. For 2020-2021, however, it is recommended that the CEO, Manager of Engineering and selected support staff be identified to work alongside the interim COO. At the beginning of 2021-2022, the remainder of the intermediate managers will be hired. Please see section 7.1 for a full governance and organizational chart for the AFNWA which identifies the full complement of senior managers.

### **License Agreements**

Finalizing BCRs will enable licensing/land access agreements to be drafted and completed with participating First Nations Bands. The AFNWA and its legal team will work directly with First Nations lands departments, ISC, and Department of Justice to create land access/license agreements that will both allow the AFNWA to enter communities, exclusively work on water and wastewater infrastructure, and indemnify Chiefs and Councils for water and wastewater service delivery.

## **8.1.2 Phase 2: Operational Funding**

This phase establishes the remaining AFNWA management team in order to complete remaining tasks identified below.

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<sup>76</sup> The OCWA Report notes that staff training is needed to ensure quality control and continuous improvement. AFNWA recognize that the areas of training require further development and that this will be reflected in the Business Plan. Implementation Planning has commenced, and the Business Plan will be developed in 2021 by the Senior Management Team after their recruitment.

### **Planning for the Implementation of an FSD “hub and spoke” operations model.**

The introduction of the AFNWA as a First Nations governing body will introduce the need to develop organizational regulations and policies for the delivery of water and wastewater services. This will be facilitated by the hiring of the remaining senior managers which is anticipated to occur by April 1, 2021 (one year after transition funding approval) with a clear preference to hire from participating Atlantic First Nations.

Management will then be responsible to develop and adopt a formal training and development program for all staff. Furthermore, senior management will develop human resource strategies that recognize the experience and knowledge of staff currently employed in water and wastewater system operation and take a consistent approach to salaries, benefits, training, and career development. The formation of a corporate structure will establish policies and procedures that support human resource management, staff interaction and core work practices. The initial policies will be developed around an industry standard approach and cover core subject areas, such as:

- Health & Safety
- Remuneration & Expenses
- Communication
- Training & Development
- Discipline
- Information Technology

AFNWA policies will address culture, tradition, and be sensitive to the diversity of multiple First Nation communities it is providing service to.

Once the CEO, senior management and legal counsel (contracted) is in place, other business activities will commence:

- Develop board by-laws
- Annual and 10-year business planning
- Develop standard operating procedures
- Implement change management and communication planning

### **Operational Planning**

Senior Management team develop an operations plan that identifies AFNWA operational funding requirements including:

- Board and management costs,
- Operating and maintenance costs; and
- Administration and accommodation costs.

### **Capital Planning.**

The implementation of the previous phases will allow Senior Management to advance their capital planning and develop key planning documents which is anticipated to be completed within 18

months (anticipated to be completed by December 31, 2021) after CEO and Manager of Engineering are hired.

With these key management hires AFNWA will be in a position to draft a 10-year capital program based on the Asset Management Plan (AMP), and incorporation of asset management planning.

In the development of the AMP the following considerations will need to be identified:

- Define assets, systems, facilities etc. that are to be included
- Determine how performance of assets will align to AFNWA objectives
- Identify methods to gather data and analysis from participating Atlantic First Nation communities
- Determine the level of service and targeted levels of services, and identify gaps
- Forecast future AFNWA growth and asset utilization
- Process to identify, intake and prioritize projects
- Summarize how assets will be managed and operated
- Model financial requirements
- Define future asset management practices including planning and monitoring

### **Ongoing Operations including Capital Investment Activities**

With the formal receipt of funding, the establishment of AFNWA operations and the development of guiding policies and asset management planning, AFNWA will be able to commence capital investment for identified priorities. Capital investment will be executed according to priorities identified through 5 and 10-year capital planning horizons, and through AFNWA Board budget approval.

Following standard procurement processes, and oversight by professional services will ensure investments are delivering successfully according to identified project objectives.

### **Implement Change Management**

AFNWA will appoint a dedicated change management team and develop a change management strategy in order to align the communications to ensure effective engagement and support. This step will be maintained for the 2-year transition period and the first year of full autonomous operation.

### **Regulatory Oversight**

Agency oversight has been identified as a best practice in the utility profession.<sup>77</sup> At some locations in this business case, extracts from source documents reference Federal departments as regulators.

Approval of the AFNWA Business Case will establish a Government of Canada funding stream and a commitment by the Government of Canada to provide support to the AFNWA throughout its ongoing operations. Devolution and self-administration of federally funded programs is not

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<sup>77</sup> Watertight, the case for change in Ontario's water and wastewater sector, Published by Ontario Ministry of Public Infrastructure Renewal, 2005

unfamiliar to the Atlantic First Nations who have pursued similar devolution in health programing. Many of the principles pursued in the health initiative are similar to those noted in the evolution of the proposal to establish the AFNWA. Like health care, a governance model for the AFNWA presents unique challenges in considering and respecting the policies, regulation and legislation related to environmental protection and water and wastewater services across three Provinces and the Federal Government. With the goal of achieving self-determination of Atlantic First Nations.

The continuation of the existing roles of the Atlantic Policy Congress, ISC and Health Canada may provide enough governance at formation of the AFNWA. Once operational, the AFNWA working with those three groups and member communities can work to establish and implement a regulatory governance structure. Key elements towards confirmation of governance will be:

- establishment of principles for provision of water and sewer services including representation in governance and communication with municipal (in the case of MTAs), provincial and federal partners.
- establishment of design standards for infrastructure and in particular for water treatment and distribution along with levels of service which meet the agreed principles.
- establishment of working agreements with all partners which meet the agreed principles; and
- establishment of metrics to be used to report to community members, governance partners and Federal funders on success meeting principles, guidelines and levels of service.

In addition to leading initiatives required to establish governance, AFNWA will confirm regulatory oversight agencies with GOC and develop a plan for implementing their requirements. As an interim step, the AFNWA and Dalhousie University will continue their work in developing a strategy for operating in the interim within an unregulated environment.

### 8.1.3 Phase 3: Detailed Business Plan and Funding

The final phase in implementing the AFNWA comprises the development of detailed budgets into a comprehensive Funding Model. The funding requirements will be subject to negotiation with ISC with the understanding that the level of funding will be in line with the order of cost identified in the AFNWA business case. As transfer agreements are finalized, AFNWA will commence full autonomous operations. Additional details are provided below.

#### **Risk Assessment**

AFNWA will prepare a detailed risk assessment to act as an input into the detailed financial model. This will be an ongoing practice within the AFNWA. The asset management plan will identify detailed operational risks; however, it will be the prerogative of the AFNWA to identify additional risks along with the appropriate mitigation strategy. Risks categories may include but are not limited to:

- Economic
- Social
- Political
- Technological
- Legal

- Environmental

### **Financial Model**

Develop a detailed financial model that incorporated inputs from the AMP, Operational plan, risk assessment and 10-year capital spending plan. The model should be sufficiently detailed to consider scenarios and risks which might impact operations and service delivery. The model will be a vehicle for agreeing to the funding model with GOC.

### **Refine Detailed Budgets and funding model**

The intention of this step is to review the detailed financial model and risk assessment with ISC and participating First Nations to develop/agree a detailed funding model

### **Transfer Agreement from Participating Atlantic First Nations Assets and Operators to the AFNWA**

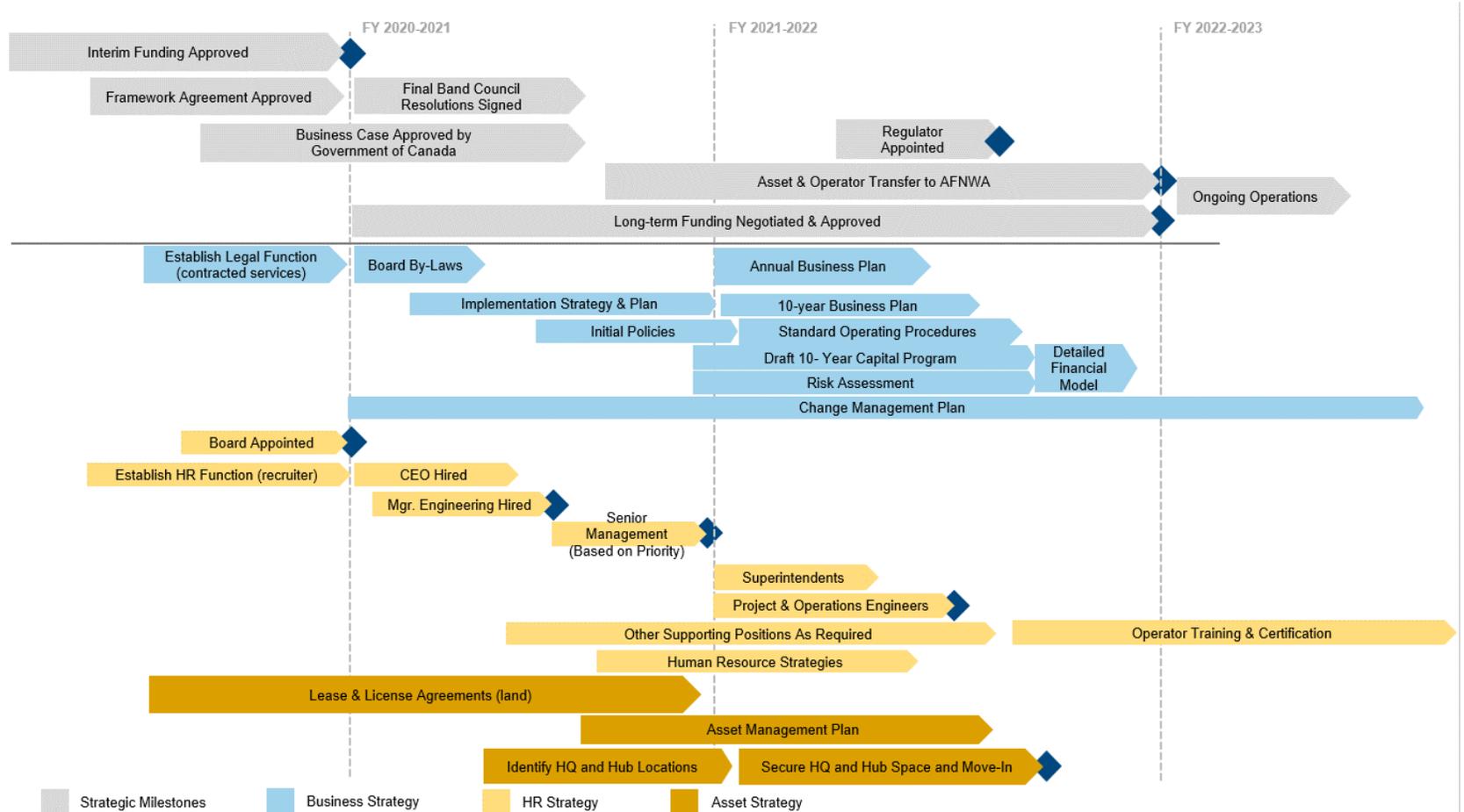
While the signing of BCR's provides AFNWA the ability to access the communities to assess engineering work, land surveys, and environmental assessments, additional regulation or policy may be required from each band to align with, participate in, or receive the direct services being provided by the AFNWA.

Formalizing transfer agreements with participating First Nation communities will coincide with the date of AFNWA full autonomous operation. The Transfer agreement will include the agreed funding model and will address how changes such as future upgrades to regulations will be dealt with. AFNWA will at that time assume responsibility for MTAs from First Nations and hard assets will need to be transferred over to the AFNWA in order to assume control over drinking water and wastewater service delivery. Transferring assets will require a reciprocal provision by AFNWA to assume all liabilities from the First Nations communities in respect to the operation and provision of water and wastewater services from the date of transfer with an ongoing indemnity to protect communities from liability. The transfer of assets and responsibility will result in the individual communities and Band Councils not having any further personal liability for the ownership and operation of water and wastewater assets from the date of transfer. This process will follow a defined transition plan as developed by AFNWA senior management.

## 8.2 Schedule

The following identifies a high-level schedule for the implementation of the AFNWA.

Figure 7 High Level Implementation Schedule



### 8.3 Change Management Strategy

AFNWA will introduce a change management strategy that provides a defined process to ensure a lasting acceptance and support of the governing body, management approach, funding arrangements and operating policies and procedures.

The primary aim of the change management strategy will be to identify the impact on local communities, water and wastewater systems, processes and the people working within, and receiving these services. As such the change management strategy will be focused on three key aspects: developing a readiness for change within the AFNWA organization formally, the Atlantic First Nations communities they provide service to, and the regulatory authorities who will provide oversight.

Typical change management strategies include the following:

- Defining the change, and indicate why the change is needed
- Identify how the change will impact stakeholders
- Implementation strategy
  - Define roles
  - Identify available support
  - Establish stages in the change process
    - Training, communications, skill development, assessments, etc.
- Identify additional plans required to ensure full implementation

A dedicated change management team will be established to ensure the change management strategy is properly implemented.

### 8.4 Communication and Outreach Strategy

Due to the cultural, geographical, variety of technical applications and complexity of communities participating in the AFNWA, a third critical piece will be to implement an ongoing communication and outreach program. Implementing this at the outset will ensure the long-term success of the AFNWA by building trust and relationships with the communities being serviced. This is complementary to the change management process and will address important organizational and operational issues related to the transition to AFNWA.

The change management strategy will be supported by a communications and public relations strategy which will help build a broad awareness of the issues AFNWA will be addressing. The strategy will build support through the engagement, education and understanding of stakeholders, identify champions, and provide information to mobilize supporters to communicate the benefits associated with AFNWA. Some of the key communication objectives include:

- Establish broad base awareness of the need for Atlantic Canadian First Nations communities to have access to clean and safe drinking water / wastewater
- Engage and educate stakeholders that there is a plan to create and manage a regional Atlantic First Nation water authority.

- Identify key stakeholders and champions that can play a role in helping to secure financial support from the federal government.
- Position and mobilize influencers with the case for support, and the right messages and tools to help secure funding and advance the development of the regional water authority

A proactive and phased communications approach is recommended in order to share the learning and research as the project advances. The following steps are recommended:

- Stage 1 Identify key stakeholders and influencers
- Stage 2 Connect and share the narrative; speak with relevance and resonance
- Stage 3 Engage influencers
- Stage 4 Educate. Identify, track and respond to questions
- Stage 5 Empower advocacy through responsive and evolving communications, and provide tools for advocacy

The change management and communications plans will continue to evolve and be refined as messages are shared with stakeholders.

## 9 Recommendations

### 9.1 Recommendations

There is a strong desire to implement the AFNWA among Atlantic First Nations and the Government of Canada, including multiple letters of support from various stakeholders (Refer to Appendix 12).

The business case recommends that the Government of Canada commit to provide 25 years operational and capital funding as set out in Tables 16 and 21 to allow the AFNWA to establish a full service de-centralized business model and adopt a hub and spoke organizational structure. This conclusion is tempered with the recommendation that a phased-in, milestone approach is adopted with a two-year transitional period between the provision of operational funding and fully autonomous operation.

Maintaining the status quo does not meet the success factors identified in the Business Case and perpetuates the issues of the past. Providing long-term Government of Canada funding will allow the AFNWA to be owned, operated and managed by First Nations.

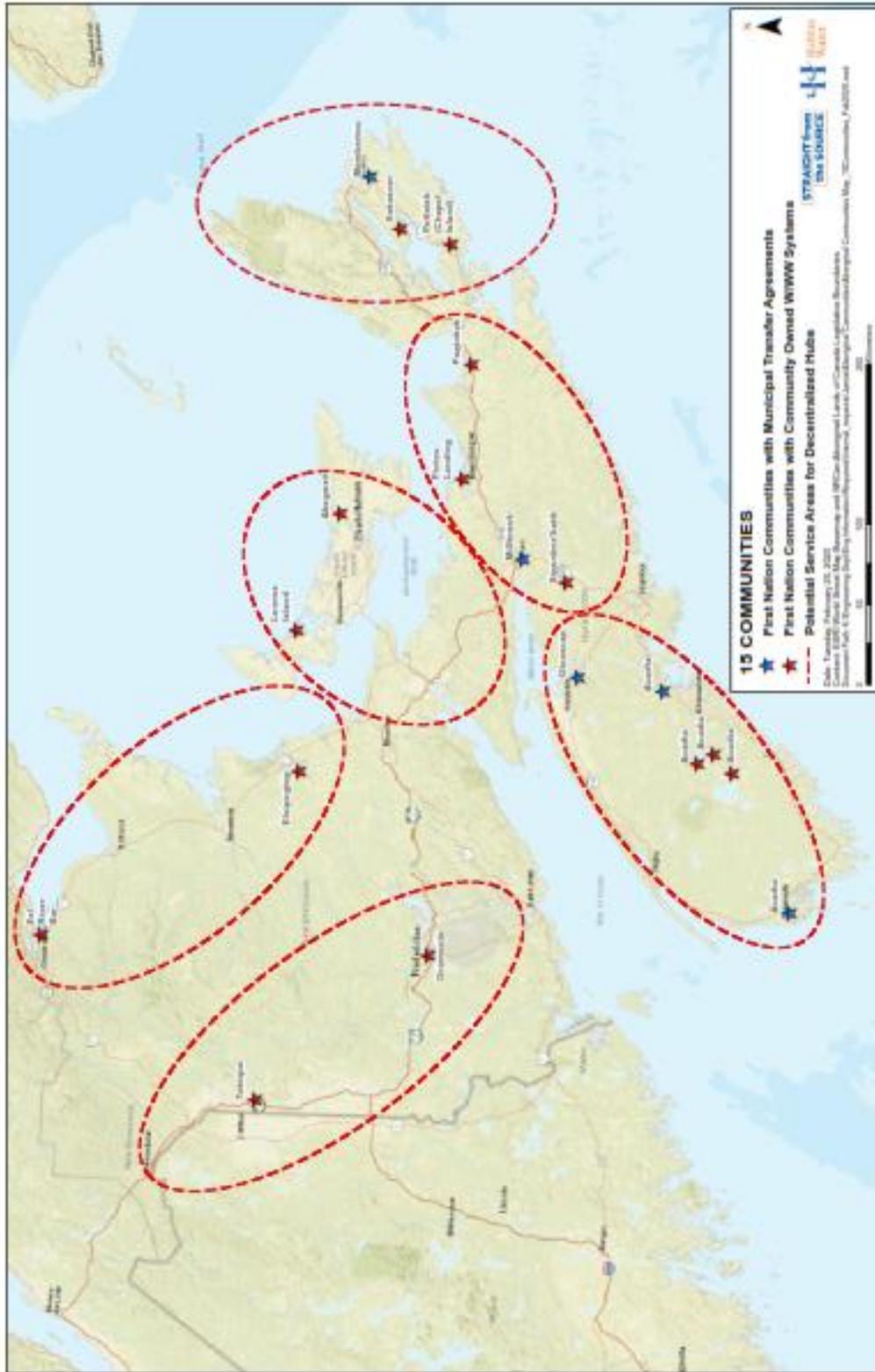
The timeline included in Chapter 8 establishes the recommended approach.

Table 28 Key Recommendations

AFNWA	
AFNWA appoint a dedicated change management team.	<ul style="list-style-type: none"> <li>Develop an AFNWA change management strategy.</li> <li>Align the communications and change management strategies to ensure effective engagement and support.</li> </ul>
AFNWA recruit and appoint senior management team	<ul style="list-style-type: none"> <li>Contract with a professional search organizational to hire the CEO and senior managers to ensure top talent is retained.</li> </ul>
AFNWA confirm regulatory Oversight Agencies with GOC	<ul style="list-style-type: none"> <li>Identify Business and Operations Regulatory oversight Agencies and develop a plan for implementing their requirements.</li> </ul>
Senior Management Team	
Senior Management develop an implementation plan	<ul style="list-style-type: none"> <li>CEO and management team develop a detailed implementation plan that addresses the sequencing of management activities required to developing policies, procedures and by-laws</li> </ul>

<p>Implement an FSD “hub and spoke” operations model</p>	<ul style="list-style-type: none"> <li>• Hire senior management staff by April 2021 (one year after funding approval) with a clear preference to hire from participating Atlantic First Nations.</li> <li>• Adopt a formal training and development program for all staff</li> <li>• Hire local operators wherever possible with an immediate focus on training and certification to align with skill-based pay.</li> <li>• Develop Human Resource strategies that recognize the experience and knowledge of staff currently employed in water and wastewater system operation and take a consistent approach to salaries, benefits, training and career development.</li> </ul>
<p>Senior Management develop key documentation</p>	<ul style="list-style-type: none"> <li>• Operations plan for years 1 and 2 of AFNWA operational funding</li> <li>• Asset management plan within 2 years of AFNWA operations</li> <li>• 10-year capital program based on the asset management plan.</li> </ul>
<p>Senior Management plan for regulatory oversight</p>	<ul style="list-style-type: none"> <li>• Develop a plan for implementing the requirements of the Business and Operations Regulatory oversight Agencies.</li> </ul>
<p>Senior Management develop procedures &amp; corporate policies</p>	<ul style="list-style-type: none"> <li>• Establish policies and procedures that provide human resource management, staff interaction and core work practices</li> <li>• Address culture, tradition, and be sensitive to the diversity of multiple First Nation bands.</li> </ul>

# Appendix 1- Participating Atlantic First Nation Communities



## Appendix 2 - Overview of Key AFNWA Engagements

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### Overall:

*The AFNWA has been a standing agenda item at each APC All Chiefs Forum and each All Chief and Council assembly.*

#### **Analysis on the Impacts of a Proposed Federal Legislative Framework for Drinking Water and Wastewater in Atlantic First Nations Communities – produced by CWRS, April 8<sup>th</sup>, 2009**

- This report reviews the 16 elements proposed by the 2006 Expert Panel and determines that 14 of these elements apply directly to First Nations in the Atlantic Region.
- The report analyzes the impacts of implementing these 14 elements in terms of relevance to First Nations communities, applying provincial requirements into First Nations communities, and also discusses options for the implementation.

#### **Drinking Water Regulatory and Operational Framework for First Nations Communities in Atlantic Canada – Proposal, January 28, 2010**

- Based on the 16 elements of a regulatory system proposed by the Expert Pany on Safe Drinking Water for First Nations Report (2006), this document reviews and develops methods for addressing these elements in First Nations Communities in the Atlantic Region.
- This proposal outlines the overall tasks that would be necessary to undertake a regulatory framework, a projected schedule and an estimated budget for the work.
- This document is proposal based on initiatives outlined at the Engagement Session on the Development of a Proposed Federal Legislative Framework for Drinking Water and Wastewater in First Nation Communities (March 31, 2009).

#### **Atlantic Policy Congress Water and Wastewater P3 Initiative Proposal – Produced by Raymond Chabot Grant Thornton. December 2, 2011**

- Initial proposal received by APC from Raymond Chabot Grant Thornton LLP for the APC Water and Wastewater P3 Initiative.

#### **APC P3 Opportunity Report by Raymond Chabot Grant Thornton, April 26, 2012**

- Report commissioned by P3 Canada to explore various options for implementing infrastructure improvements and conducting ongoing O&M of the WWW systems in the Atlantic FN Communities.

#### **Atlantic Canada Water Authority Governance Structure. Prepared by CWRS, March 31, 2012**

- This report outlines a proposed governance structure for the Water Authority, under the requirements for a P3 Canada agreement.
- The report suggested 3 options for the development of preliminary organizational structure of the Water Authority. Option 1: The water authority to be established as a Crown Agency for regulating and monitoring drinking water and wastewater systems; Option 2: The Water Authority would be established as a private company with asset ownership; Option 3: The Water Authority would be established as a corporation by a special federal act. The 3 options were compared and

options 2 or 3 were recommended over option 1 based on the overall scope, and the type of management/ownership needed for this project.

- The report also discusses the structure of the Board of Directors and the powers associated with being a Director.

#### **Atlantic Canada Water Rate Study. Prepared by CWRS. March 31, 2012**

- As commissioned by APC, the purpose of this report was to conduct a water rate study for utilities in Atlantic Canada to determine the best path forward for Atlantic Canadian First Nations communities in developing a water-pricing model.
- The recommendation proposed in this report was to adopt a volumetric rate structure which would lead to lower consumption rate and in turn, lower operating costs for the facility. Through a metered approach, the facility has a much better understanding of the state of the distribution system and will be able to identify leaks much more efficiently.

#### **Water and Wastewater Regulatory Benchmarks for First Nations Communities in Atlantic Canada. Prepared by CWRS, March 31, 2012**

- The purpose of this report was twofold:
  - (1) to develop a regulatory benchmark for First Nations water and wastewater operations in Atlantic Canada based on the 16 elements defined by the Expert Panel on Safe Drinking Water for First Nations (2006), and (2) to assess the requirements of conducting pilot trials within 4 communities in Atlantic Canada to evaluate their compliance with the proposed regulatory benchmark as developed.

#### **Water and Wastewater Infrastructure Asset Condition Assessment by the Centre of Water Resource Studies Dalhousie University and CBCL Limited. 2012-2013**

- Covered 28 of 33 communities in NS; NB, PEI and NFLD.
- Of particular emphasis, adding to the accuracy and efforts of the Neegan Burnside Report, CWRS added the consideration of applying First Nations Regulatory Benchmarks for water and wastewater systems.
- The study evaluated water and wastewater system conditions in terms of compliance, operations, capacity and management efficiency.
- A large part of the assessment was focused on an in-depth cost analysis investigating the cost of replacing systems, as well as increased operational costs for each system.

#### **Atlantic First Nations Water and Wastewater Initiative—Pre-Business Case Work by Raymond Chabot Grant Thornton, March 2013**

- Report commissioned by APC to provide a detailed costing analysis on sources and uses of funding for W/WW activities in the Atlantic Region.
- The document focused on in-depth cost analysis, covering costs categories such as energy, chemical, labor, and specific capital expenditures related to water and wastewater infrastructure.

#### **Regulatory Benchmark Pilot Trials for First Nations Communities in Atlantic Canada – prepared by CWRS, April 1, 2013**

- This report was commissioned by APC to launch a pilot trial in four First Nations communities to investigate the capacity of existing water and wastewater systems to incorporate the upcoming proposed regulatory structure.

- The bulk of the report starts by providing an overview of the regulatory structure to be implemented in communities and presenting results obtained from the pilot trials along with providing a description of the approach used. The water quality results are discussed, and costs of operation and maintenance activities are investigated and discussed.
- The conclusion of the report provides a brief overview of each community in terms of water quality data, costs estimates and feasibility of implementing the proposed regulatory structure.

#### **Options for a Regional First Nations Water Authority – Prepared by CWRs. July 15, 2013**

- The purpose of this document was to outline many options available to the First Nations Water Authority according to information retrieved from all reports produced including proceedings from various workshops.
- The options and suggestions of this report include topics such as incorporation, board of director's structure, management structure, and P3 models for community management, liability insurance, and the use of water metering and enforcement of regulations.

#### **Proposal: Atlantic Canada First Nations Water and Wastewater Initiative Activities 2013-2014**

- This proposal outlines all tasks and activities that have occurred and tasks and activities that still need to be identified and completed.
- The document is divided into suggested phases for the project, which includes work plans, timelines, communications plans and regulatory regimes.

#### **Atlantic Policy Congress Water Wastewater Project – Gap Analysis of Cost Estimates, Design and Technical Study completed by P3 Canada, March 2014**

- This report is an in-depth cost analysis of using a P3 model for the rehabilitation and on-going operations and maintenance of water and wastewater infrastructure across a number of First Nations communities in the Atlantic Region.

#### **APC Water/Wastewater Project – Preliminary Project Plan completed by KPMG, March 28, 2014**

- The purpose of the preliminary project plan is to: (1) Identify the major work steps and activities through the planning and development phases of the project; (2) visualize the work steps required to progress the project through to construction and ongoing operations; (3) provide a forum for the project stakeholders to discuss and confirm what is required for the project to move forward; and (4) secure commitment and resources from the project stakeholders and other relevant parties to complete various work steps and activities.

#### **Project Charter – First Nations Clean Water Initiative – Atlantic Region, July 15, 2014**

- The Project Charter serves as the main project management tool to ensure that all aspects and deliverables of the proposed AFNWA are completed.
- There are three major deliverables within the scope of the Project Charter: (1) The creation of the Water Authority as a corporate entity, (2) The transfer of existing water and wastewater assets to the Water Authority, and (3) The consideration of a Public-Private Partnership proposal for the upgrade and long-term maintenance of water and wastewater systems in Atlantic First Nations communities.
- Incorporation is the primary and priority deliverable to INAC, as well as the trigger for funding and other determinations/answers to many of the Chiefs' concerns.

#### **Communications Plan – First Nations Clean Water Initiative Atlantic Region, October 2014**

- The purpose of the document was to establish a multi-year communications plan to be carried out simultaneously with the Project Charter.
- The main strategy and approach of this plan were divided into 5 main stages: identify, connect, engage, mitigate, and maintain. These 5 stages will help ensure that all communications aspect throughout the life of this project are addressed and solved to the best of the communication team's ability.

#### **Joint Progress Briefing Note – Asset Inventory, October 2014**

- **July 2014 – Draft of Owner's Engineer RFP** -- Developed by Dalhousie University and sent to P3 Canada in September 2014 and AANDC in October 2014.
- **October 2014—Field Campaign for all First Nations Communities** – Field campaign included the initial lift of water and wastewater infrastructure and the update of the existing cadastral mapping of the Indian Reserves in Atlantic Canada.

#### **First Nations Clean Water Initiative Atlantic Region – ADM Briefing, December 2014**

- This ADM briefing was in the form of a power point presentation and outlined the AFNWA project goals, principals, and activities broken down into 4 phases. Phase 1: Approval of the initial timeline, Phase 2: Initial Implementation of project elements, Phase 3: Community approval through a vote, and Phase 4: P3 Business Case

#### **FNCWI Website Launch, 2015-2016**

- Dalhousie engaged further with 3'Oclock Communications on several occasions during December 2015, which produced tentative website design and logo. In consequence, tentative website design and logo have been presented to APC for feedback. The final website design was approved. The website went live on the January 20-21<sup>st</sup> workshop date – [www.fncwi.ca](http://www.fncwi.ca)

#### **Draft Corporate Operations Package, February 2015**

- Dalhousie worked with McInnis Cooper to develop a term sheet for the Atlantic First Nation Water Authority – completed February 2015.

#### **Request for Service—For Call Up Against Supply Arrangement (SA) — prepared by PPP Canada, March 2015**

- PPP Canada put forth a request for proposal, in order to engage a technical advisor (engineering firm) and a cost consultant from engineering, design and cost-estimation experience in the field of water and wastewater treatment and conveyance systems.
- PPP Canada request for proposal requires an assignment that would include successful schematic level design and cost estimate for the rehabilitation of water and wastewater systems. Regarding cost estimation component, a completion of a Gap Analysis that assesses the capacity and performance of the existing assets and compares them to future needs; As per PPP Canada Schematic Design Estimate Guide (SDEG) for all components of the project. These components include treatment plans, pumping stations, residual waste treatment systems, storage facilities and the overall conveyance systems.

#### **First Nations Clean Water Initiative Atlantic Region – Briefing Note, March 20, 2015**

- The purpose of this briefing note was to update Chief and Council on the progress, the main advantages and the benefits of following a P3 financial model for the Atlantic First Nations Water Authority.

## Workshops, Meetings, and Forums

### Atlantic First Nation Housing & Infrastructure Network – Water and Wastewater Committee Meetings, 2010-2012

- The purpose of the Water and Wastewater Committee, as supervised by the Senior Housing and Infrastructure Committee, was to discuss long-term sustainability of water and wastewater management, develop innovative strategies that will address water and wastewater issues, and to recommend changes to policies and share best practices to improve the design, delivery and implementation of infrastructure programs.
- Water and Wastewater committee members promoted activities and documentation that support the ultimate goal of having sustainable management of water and wastewater infrastructure in First Nations communities.

### October 25, 2013 – Safe Drinking Water for First Nations Act: Regulatory Development Intergovernmental Engagement.

- This document presents proceedings from a meeting called on by INAC to facilitate an information exchange between water and wastewater management stakeholders. The provinces were invited as technical experts and the purpose of the meeting was not to gage their interested in taking on an active role in the activities related to development of a First Nations water and wastewater regulatory regime.
- Topics of discussion included approvals to operate, monitoring, emergency response, testing and sampling, awareness, record keeping, compliance and enforcement, municipal transfer agreements and other agreements, legal issues, First Nations specific issues, and information sharing.

### March 2014 – Atlantic First Nations Water Authority Summary Report – prepared by CWRS

- This report summarizes the outcomes of the four workshops that were held with technical experts, the federal government and First Nations leaders to discuss options for a Water Authority moving forward. The workshops were held on June 25<sup>th</sup>, July 15<sup>th</sup> and Dec 2<sup>nd</sup>, 2013, and March 3<sup>rd</sup>, 2014.
- As a result of the first two expert workshops, the Coop model was deemed to be the most promising due to the fact that it is a one-member one-vote situation, providing equity amongst communities.
- During the December 2<sup>nd</sup>, 2013 meeting, issues arose with respect to generation of surplus funding and how this would be distributed
- As a result of the March 3<sup>rd</sup>, 2014 meeting that the model moving forward would be a not-for-profit corporation through the Not-For-Profit Corporations Act.

### January 20, 2015 – Land designation workshop

- Dalhousie helped to organize a one-day land designation workshop that was held in Dartmouth on January 20, 2015 (Dartmouth, Holiday Inn) – led by National Aboriginal Land Managers Association (NALMA), based on their land designation toolkit.
- APC and Dalhousie engaged McInnis Cooper to participate in a meeting with APC and Lands Activity Team on February 27, 2015 over land designation discussions, which led to the creation of a term sheet for lease development entitled “Lease Development Assumptions”.
- Received Lease Development Assumptions document from Lands Activity team on March 4, 2015 and provided suggested revisions.

## **CWRS 2015 – February 2015 – Atlantic First Nation Water Authority Governance Report – Governance workshop – prepared by CWRS**

- On January 21, 2015, a workshop was held on corporate governance and unique issues related to the Water Authority. The goal of the workshop was to provide all participants with an understanding of corporate governance best practices, and to engage in discussion about specific governance issues that must be addressed in order to organize and operate the Water Authority.
- Participants were actively engaged with questions and feedback and detailed ideas were expressed:
  - Board Size: 7-11 members were recommended
  - Observing Board Members: during the start-up period of the Water Authority, it was recommended that a representative from each community be present at board meetings
  - Selection of Board Members: in general, participants were in favor of representation by province or region. It was also suggested that communities establish a nomination committee.
  - Length of Term: Participants recommended a staggered four-year term
  - Selection of Chair: Participant consensus was that the Board would be responsible for nominating/electing a Chair.
  - Transparency: It was suggested that board meetings could rotate between public and closed door.
  - One member, one vote).

### **February 17, 2015 – First Nations Clean Water Initiative Atlantic Region: Land Tenure and Land Access Working Group Meeting.**

- The purpose of this working group meeting was to discuss proceedings from the January 20/21 Water Authority Workshop, and to ensure that the message of the Water Authority and the subsequent land tenure activities are to be as clear, concise and reliable as possible.
- All information from this working group was collated and presented at the March 2015 All Chiefs Forum.

### **December 2<sup>nd</sup> and 3<sup>rd</sup> 2015—Governance Focus Group:**

- A focus group held on December 2<sup>nd</sup> and 3<sup>rd</sup>, 2015 focused on the Atlantic First Nations Water Authority's (AFNWA) governance; specifically, on the Board of Directors structure and composition. The participants of the focus group decided on the following recommendations for the structure of the Board of Directors within the Water Authority.
  - **Board Size:** Maximum of 15 Directors; minimum of 12 First Nations (FN) Representatives, and 3 Technical Experts.
  - **Selection of Shareholder Representatives:** The participating communities (i.e., shareholders of the AFNWA) will individually elect one shareholder representative for their community.
  - **Selection of Board Members:**
    - **First Nations Representatives:** 12 Directors of the AFNWA shall be elected at a shareholder meeting. The Directors shall meet a set of director qualification, including stipulations put forth by the *Not-for-Profit Corporations Act* (i.e., must be over 18 years of age, and must not have declared bankruptcy) and as set out in the by-laws and AFNWA policy.

- **Technical Experts:** Technical experts shall be interviewed and selected by a nomination committee. The nomination committee will include members from the 12 FN board members and may include the Chief Executive Officer (CEO).
- **Chief Executive Officer (CEO):** The CEO will not be a voting member of the board.
- **Length of Term:** The length of term shall remain flexible, with the Directors being appointed to serve staggered terms of 2, 3, or 4-year terms. Directors are able to serve for up to 2 consecutive terms.
- **Transparency:** Regular board meetings shall remain open to the public and may be broadcasted on the internet for additional accessibility. There shall also be a “closed” portion of each meeting in order to discuss sensitive topics, where the public will be asked to leave. The public will be provided with the motions passed/rejected during the closed portion.

### January 2016—All Chiefs Forum – Clean Water Initiative

- A major meeting organized by APC in January 2016, attended by all Chiefs of Atlantic First Nation communities, had centered on annual priorities and concerns of APC’s overall departmental portfolio’s outcomes and objectives with significant attention devoted on the AFNWA initiative.
- An APC resolution to incorporate the Water Authority narrowly did not pass due to some concerns over asset-transfer and funding functions of the AFNWA. APC and its partner CWRS of Dalhousie University responded that such concerns would be resolved by governance and institutional organization enabled through incorporation of the AFNWA.
- In response to the All Chief Forum’s concerns, APCs Housing and Infrastructure staff determined specific steps may be required to move CWI communication forward. Staff recommended revised communication may strengthen APC’s ability to allay.

### Corporate Structure Engagement

Halifax Water participated in the APC Atlantic First Nations Water Forum held on March 15 and 16, 2017 in Dartmouth, NS. In attendance were Chiefs and operations staff from over 12 First Nation communities, APC staff, ULNOOWEG staff and representatives from Dalhousie University, Indigenous and Northern Affairs Canada (INAC) and Public Health agencies. The Water Forum was held to update First Nation communities on activities related to the Clean Water Initiative with a focus on regulations and activities directly related to the formation of the AFNWA. Halifax Water was invited to present on the aspects of operating a water and wastewater utility in a regulated environment and to introduce the current project on corporate structuring of the AFNWA. Halifax Water and Accelerator representatives also participated in a panel discussion at the end of the Water Forum in relation to the broader implications of the Clean Water Initiative.

In terms of receiving feedback on the implications of the AFNWA, several themes emerged which shed light on how a utility should operate and serve First Nation communities. Central to the success of the AFNWA is the need for ongoing collaboration, public outreach and communication. The participants also had a strong sense of environmental stewardship with a time frame that considers seven generations. In addition, in traditional teachings and displayed at the Water Forum, First Nation women have a sacred connection to water.

As a follow up to the concerns expressed about water and wastewater operators, the general manager of Halifax Water met with operators from First Nation communities at the Maritime Provinces Water and wastewater Association (MPWWA) conference in Halifax on April 24, 2017. During the session, concerns and comments were received:

- Operator salaries are low (many are making in the order of \$30,000 annually which is half the market rate) and as a result some have left the community to find employment elsewhere.

- There is a lack of understanding about water and wastewater systems and a need to educate the broader community on the complexities and importance of maintaining systems in a state of good repair.
- There is a negative perception of Public Private Partnership (P3) approaches, which influenced some First Nation communities to not introduce band council resolutions to participate in the APC initiative to consider formation of the AFNWA.

### Chief & Mayor Meeting

As a follow up to views expressed at the Water Forum, APC also facilitated a meeting of First Nations Chiefs, Halifax Regional Municipality Mayor Mike Savage and Councillor Russell Walker (Vice Chair of Halifax Water) on April 27, 2017 at the Lake Major water supply plant in Dartmouth, NS. The session was held primarily for First Nation Chiefs to gain insight on the governance aspects of a water and wastewater corporation (Halifax Water) and relationship with its owner, the Halifax Regional Municipality (HRM). In addition to attendance by eight Chiefs, representatives from APC, Dalhousie University, Accelerator and Halifax Water also participated. After an informal meet and greet over lunch, the general manager of Halifax Water provided a presentation on utility governance. The presentation provided a history of Halifax Water, its relationship with regulators, its approach to sustainability, an overview of rate structures and an overview on the relationship with HRM. Key themes and concerns expressed by the Chiefs, Mayor Savage and Councillor Walker included:

- The critical nature of water and wastewater services to support public health, economic development and protection of the environment; communities cannot thrive without it
- The importance of a professionally managed utility with a business approach and service culture with abilities to respond to emergencies
- Recognition that elected officials have to wear a different hat when serving as Utility Board members; decisions are based on the best interests of the utility and its customers above specific constituents' concerns
- Recognition that water meters are necessary for utilities to manage the distribution system. It is important to monitor customer usage to minimize leakage, which if left unchecked, would increase costs and jeopardize service to all customers. A discussion ensued where First Nation representatives recognized that meters could also play a role in collecting some revenue as some communities are paying for the service now
- In addition to an understanding that a First Nations Water Authority would need to be accountable to a regulator for the quality of drinking water and wastewater effluent, there was discussion on the potential for a regulator to monitor the business aspects of a utility

On May 1, 2017 the APC arranged a meeting of 7 Elders from PEI, NB and NS, several members of APC, including the Executive Director John Paul, and Rod Burgar, a member of the project team. The purpose of the meeting was to receive the advice of the Elders on the cultural and spiritual significance of water in the context of the AFNWA.

Over the course of the day the Elders elaborated on the historic place water holds for First Nations, the importance of protecting water for future generations and the responsibilities the AFNWA must assume if it is authorized by the community owners to manage water and wastewater in the Atlantic Region.

Specific topics that were discussed included:

- Cultural and spiritual significance of water
- Decision-making: community, tribal and regional
- Structuring the AFNWA so it is by and for First Nations across the region
- Values that are connected with water both as an object and as a living spiritual entity
- Two-Eyed Seeing; traditional knowledge integrated with western science
- The need for engagement and communication about the operation of the AFNWA

The advice and conversation among the Elders were recorded in a Report entitled: "Creating an Atlantic

First Nations Water Authority with Culture as a Foundation” and also in two pictorial story boards: ‘Cultural and Spiritual Significance of Samqwan’/Sama’qwon and ‘Atlantic First Nations Clean Water Initiative’ which are depicted below as Chart 2 and 3, respectively.

A second meeting of Elders was held on July 5, 2017. The purpose of the meeting was to review the draft Final Report with the Elders prior to the July 10th workshop to determine if the Report reflected the advice, they had provided previously on how to ensure traditional First Nations culture and values are embedded in the AFNWA. The Elders reviewed and discussed the results from the earlier storyboards and found that they captured the essence of their conversation. In addition, the meeting provided an opportunity to provide an overview and receive feedback on the four alternatives for a corporate structure of the AFNWA. The pros and cons of each alternative were discussed and ultimately the Elders revealed a preference for the full service, decentralized model. Other key themes discussed during the session included:

- The question on “Authority” as a name for the organization; it was suggested that the final name could be changed later once the organization is set up
- Mother Nature and her concerns appearing through climate change
- Communities shouldn’t have the sole authority to control water as there is a collective stewardship responsibility
- Prioritize needs and a proactive approach through the AFNWA with a standard level of service over time
- The AFNWA can facilitate activities and negotiate with neighbour municipalities on behalf of local communities
- The AFNWA can serve the collective interests of First Nation communities with the resources needed to solve problems
- Clean drinking water is a human right; the AFNWA Board should set policy which could incorporate a mission statement and values
- The AFNWA has responsibility to educate communities in matters of water
- A water theme toolkit should be produced by the AFNWA to educate youth; Elders wisdom should be incorporated
- It was noted that the costs of the AFNWA Board were not included and a statement in the final report should reflect this fact with an estimate of annual costs.

During the second meeting, the Elders suggested the AFNWA adopt the following as the mission statement: “To provide clean and safe water and wastewater for all Atlantic First Nations Communities”. A new storyboard was created as a result of this meeting which reflects the mission statement and depicts the preferred corporate alternative (full service-decentralized) for the AFNWA with its operations based on a regional hub and spoke alignment. A copy of the storyboard is contained in the Executive

On May 24, 2017, a workshop was held with First Nation leaders to review the preliminary report on corporate structure alternatives for the AFNWA. Participants in the workshop included First Nation Chiefs, Elder Albert Marshall, operators from First Nation communities and representatives from APC, INAC, Dalhousie University and ULNOOWEG. In addition, a graphic artist was present to capture the essence of the workshop, including pros and cons of each of the four corporate structure alternatives. This is depicted below (as Chart 4 and 5, respectively) in two pictorial story boards: ‘Atlantic First Nations Water Authority’ and ‘Atlantic First Nations Water Authority: Corporate Structure Options’.

The general manager of Halifax Water provided a presentation on the four-corporate structure alternatives, namely; full service - centralized; full service - decentralized; full outsource; and technical services support. The overview included a detailed explanation of each alternative and preliminary costing. Through feedback, questions and discussion, there was a clear indication that the full outsource alternative was the least preferred and there was a preference for the full service – decentralized model.

Notwithstanding the findings from the May 24, 2017 workshop, a second First Nation Leaders workshop

was held on July 10, 2017 to receive additional feedback on the corporate structure alternatives and the recommendations to operationalize the AFNWA. A draft final report, dated June 30, 2017 was circulated in advance of the workshop and the general manager of Halifax Water provided an overview of the key recommendations including details on the preferred corporate structure. The preferred structure is a full service, decentralized model with operations set up with a regional hub and spoke approach.

On June 27, 2017 a workshop was held with operators and administrators from First Nation communities, APC staff and Halifax Water managers experienced in water and wastewater system operations. The purpose of the workshop was to review the preliminary report produced by Halifax Water and Accelerator and solicit feedback on the alternative corporate structures from operators employed by First Nation communities. The workshop was aided by a presentation from the general manager of Halifax Water which was similar to the one provided at the First Nation Leaders workshop on May 24, 2017. The format was an open forum where questions and concerns were expressed throughout the presentation and afterwards in a general discussion.

Much of the discussion centered on the practical aspects of operations including the approach to regulations for a regional water utility operating in the diverse communities of Atlantic Canada. As disclosed in previous studies and discussed at the Water Forum on March 15 and 16, 2017, it was acknowledged that Dr. Graham Gagnon of Dalhousie has proposed regulations to serve as a framework within Atlantic Canada to ensure a consistent approach. A considerable time was spent on discussing the implications of growth in First Nation communities and how a utility will incorporate this into its strategic plans. It was articulated that the AFNWA should develop an integrated resource plan to include growth, asset renewal, regulatory compliance and level of service. A key pursuit of the AFNWA will be to provide a consistent level of service over time and prioritize projects based on need. Also, on the minds of operators was the need for a consistent and higher standard for safety. All saw the formation of the AFNWA as an opportunity to deliver services in a much safer manner. The operators discussed the aspect of meters installed within homes and businesses, which may be perceived as a move to charge for water.

All recognized the importance of meters to measure consumption for operational reasons to keep flows within the range for optimal treatment and minimize wastage due to leakage. It was also acknowledged that a future AFNWA may have to adjust staffing levels to balance its operations approach with the community expectations for service.

After reviewing the pros and cons of the four alternative corporate structures, it was clear that the operators preferred a full-service approach. Time was then spent comparing the centralized versus decentralized options. Based on this discussion, a consensus was reached amongst the operators that a decentralized structure was the most appropriate and would likely be well received by communities. The operators confirmed that a key feature to support relationship with First Nation communities were the hub and spoke approach that embeds supervisors and operators directly in the communities. This is a finding consistent with other organizations operating or supporting water and wastewater systems across Canada.

## Appendix 3 – Key First Nation Developments Addressing Water and Wastewater Regulatory Gap

The following provides lists of institutional (Table 21) and internal (Table 22) developments which has addressed water and wastewater gap for the First Nations

*Table 21 List of Institutional Developments*

Institutional Developments	Brief Description
Indigenous and Northern Affairs Canada (INAC) (2003)	Report analyzes state of drinking water safety for FNCs through on-site assessments
Office of Auditor General Report. (2005)	Report cites unbalanced quality of FN water relative to non-native communities of similar sizes/locale
Plan of Action for Safe Drinking Water (2006)	INAC action plan to address the most significant water problems on reserves, establish national standards of operation for water treatment facilities, as well as ensure that all operators of water systems received mandatory training. Plan created Panel 2006; Committee 2007, Assessment 2011, Act 2013.
Expert Panel on Safe Drinking Water for First Nations (2006)	Multi-stakeholder panel examined options for a regulatory regime for First Nations' drinking water. The panel recommended commissioned Indigenous oversight, which would include inspections and holding particular parties, including federal Agencies, to account. The Panel identified 16 elements of a proposed regulatory system.
The Senate Committee on Aboriginal Peoples (2007)	The committee primarily recommended for INAC to engage a comprehensive consultation process with First Nations communities and organizations regarding legislative options, including those set out in reports of the Expert Panel on Safe Drinking Water and the Assembly of First Nations, with a view to collaboratively developing such legislation.
Auditor General Report (2011)	One of the main recommendations related to water and wastewater programs was a call for a regulatory regime to be implemented in First Nations communities because provincial legislation and regulations are not applied on First Nations reserves
Neegan Burnside Assessment (2011)	As part of the First Nations Water and Wastewater Action Plan, Neegan Burnside Ltd. was hired by the Canadian government to conduct an independent assessment of the state of water infrastructure in these communities. 807 systems in 560 communities were assessed. It found a vast majority of the Atlantic First Nations Drinking Water systems failed the Guidelines for Canadian Drinking Water Quality (GCDWQ)

Institutional Developments	Brief Description
Safe Drinking Water for First Nations Act (2013)	The Act called for enforceable regulatory standards, in order to ensure safe drinking water, effective treatment and source water protections. The Act also places Chief and Council completely liable and responsible for the state of drinking water and wastewater discharge within their community. Act clearly defines lines of responsibility between the owner and regulator of water assets. This Act would be an enabling statute for AFNWAs regulatory capacity

*Table 22 List of Internal Developments*

Internal Developments	Brief Description
Regulatory Benchmarks Report – Dalhousie CWRS (2009)	Report determines 14 of the 16 elements proposed by Panel 2006, have direct application to the Atlantic FN context.
Drinking Water Regulatory and Operational Framework Proposal – Dalhousie CWRS (2010)	Proposal developed methods for operationalizing 14 compatible elements.
APC Water and Wastewater P3 Initiative Proposal (2011)	Initial proposal received by APC from Raymond Chabot Grant Thornton LLP for the APC Water and Wastewater P3 Initiative
APC P3 Opportunity Report (2012)	Report explored various options for implementing infrastructure improvements and conducting ongoing O&M of the WWW systems in the Atlantic FN Communities.
Atlantic Canada Water Authority Governance Structure – Dalhousie CWRS (2012)	Report outlines a proposed governance structure for the Water Authority, under the requirements for a P3 Canada agreement. Amongst its three core recommendations, it was eventually adopted that a not-for-profit corporation, by federal statute, would be suitable for the AFNWA.
Atlantic Canada Water Rate Study – Dalhousie CWRS (2012)	Report recommended a volumetric rate structure, which would lead to lower consumption rate and in turn, lower operating costs for the facility

Internal Developments	Brief Description
Water and Wastewater Regulatory Benchmarks for First Nations Communities in Atlantic Canada - Dalhousie CWRS (2012)	Reported developed regulatory benchmarks for First Nations W/WW operations based on the 16 elements from Panel 2006.
Water and Wastewater Infrastructure Asset Condition Assessment - Dalhousie CWRS, CBCL (2012)	Study evaluated water and wastewater system conditions in terms of compliance, operations, capacity and management efficiency
Pre-Business Case Work (2013)	Raymond Chabot Grant Thornton report which provides a detailed costing analysis on sources and uses of funding for W/WW activities in the Atlantic Region
Regulatory Benchmark Pilot Trials - Dalhousie CWRS (2013)	Report covers a pilot trial in 4 First Nations communities to investigate the capacity of existing water and wastewater systems to incorporate the upcoming proposed regulatory structure.
Options for a Regional First Nations Water Authority - Dalhousie CWRS (2013)	Report outlines governance options such as incorporation, board of director's structure, management structure, P3 models for community management, liability insurance, the use of water metering and enforcement of regulations
APC – First Nation Asset Condition Assessments – Final Report. CBCL (2013)	Report provides a Class C cost estimate for infrastructure necessary to bring water and wastewater infrastructure in participating communities, up to regulatory compliance. Further defined, the objectives can be summarized as follows: to perform Asset Condition Assessments for water and wastewater assets in 22 First Nation, Communities in Atlantic Canada, to address the infrastructure gap between existing systems and the proposed regulatory benchmarks, and to complete Class C cost estimates for capital project upgrades necessary to meet the regulatory benchmarks.
Atlantic First Nations Water/ Wastewater Initiative Activities – APC (2013-2014)	Proposal outlines all tasks and activity deliverables, including ones that need to be completed

Internal Developments	Brief Description
APC Water Wastewater Project – Gap Analysis of Cost Estimates, Design and Technical Study – P3 Canada (2014)	Report is an in-depth cost analysis of using a P3 model for the rehabilitation and on-going operations and maintenance of water and wastewater infrastructure across a number of Atlantic FN regions
APC Water/Wastewater Project – Preliminary Project Plan (March 2014)	The purpose of the preliminary project plan is to determine the project management cycle and phase deliverables/milestones crucial to developing the AFNWA
Project Charter – CWI – API, P3, NRCan, INAC (2014)	Project Charter serves as the main project management tool to ensure that all aspects and deliverables of the proposed AFNWA are completed. Project Charter details requisite steps required for all stakeholders, especially APC, FN communities, INAC and P3 Canada, to determine the value of money and the potential of a P3 option
CWI Communications Plan - API, P3, NRCan, INAC (2014)	Document was to establish a multi-year communications plan to be carried out simultaneously with the Project Charter
First Nations Clean Water Initiative Atlantic Region – ADM Briefing – APC, INAC (2014)	ADM meeting outlined core project accomplishments, including community approval through a vote, and a P3-led business plan
FNCWI Website Launch – CWRS (2015)	Final website design launched <a href="http://www.fncwi.ca">www.fncwi.ca</a>
Draft Corporate Operations Package – McInnes Cooper, CWRS (2015)	Term sheet developed for the Atlantic First Nation Water Authority.
Request for Service—For Call Up Against Supply Arrangement (SA) – P3 (2015)	RFP Proposal engaged bidding process participated by various engineering firms and cost consultants. RFP requires successful schematic level design and cost estimate for the rehabilitation of water and wastewater systems.

## Appendix 4 – AFNWA Strategic Alignment

The following summarizes AFNWA key stakeholders, their primary goals and priorities, and key means by which the AFNWA meets these goals and priorities.

<b>Atlantic First Nation communities</b>	
<b>Goal</b>	<b>How AFNWA supports</b>
Deliver safe drinking water	Implement consistent standards across all communities, upgrade and maintain systems to current and future standards  Address Drinking Water Advisories to mitigate potential public health risk to the community;
Deliver safe, efficient and reliable wastewater services	Implement consistent standards across all communities, upgrade and maintain systems to current and future standards  Enhance capacity development of water/wastewater treatment plant operators and community-based water monitors;
Cost effective water and wastewater services	Implement standardization, centralized administration to reduce costs, implement processes and asset management plans to maintain systems
Provide local customers with safe drinking water and wastewater services.	Implement consistent standards across all communities, upgrade and maintain systems to current and future standards, maintain relationships and contractual relationships with municipal water authorities (where applicable)  Ensure delivery of drinking and raw water quality monitoring are initiated and sustained  Ensure AFNWA board has geographic representation.
Manage water and wastewater services in 15 communities covering 25,000 people and 4,400 households in Atlantic Canada	When established, 79% of Atlantic FN people will be serviced under the water authority

<b>Atlantic First Nation Leadership</b>	
<ul style="list-style-type: none"> <li>- Formal Elected Councils</li> <li>- Chiefs</li> <li>- Elders</li> <li>- Atlantic Policy Congress (APC)</li> </ul>	
<b>Goal</b>	<b>How AFNWA supports</b>
Strengthen culture and traditional ties with water	Integrate Two-Eyed Seeing, Wise Practices within AFNWA governing model, processes and procedures. Develop Elder Council and ensure majority of board is drawn from member communities.  Ensure AFNWA board has geographic representation.

Economic development of communities	AFNWA invests in a regional model which requires employment to be located at the community utility systems
Provide AFNWA and communities information to make informed decisions.	Integration with AFNWA governance model / structure  Ensure AFNWA board has geographic representation.  Incorporating indigenous procurement

**Government of Canada**  
- Department of Indigenous Services Canada

<b>Goal</b>	<b>How AFNWA supports</b>
Establish First Nation self-determination, self-governance and support First Nation financial control.	AFNWA is a governing and management body for water and wastewater services in Atlantic First Nation's communities of Atlantic Canada  Ensure AFNWA board has geographic representation.
Modernization of institutional structures and governance of First Nations	AFNWA establishes the precedent for First Nation governance across Canada and across sectors

**Standards and Regulatory Organizations**  
- Health Canada  
- Environment Canada

<b>Goal</b>	<b>How AFNWA supports</b>
Ensure Atlantic First Nations meet regulatory water and wastewater standards	Implement current and future regulations in AFNWA process
Ensure delivery of drinking water monitoring programs are implemented, and their oversight role is supported	Provides a singular point of contact for all participant Atlantic First Nation communities to establish a consistent monitoring program
Defer responsibility of First Nation communities' systems and their associated liability of asset to First Nations communities (clarify MTA delivery roles and responsibilities)	Centralized communications to one self-governing body, implement asset investment is conducted to maintain levels of service requirements  Ensure AFNWA board has geographic representation.
Ensure source water protection is maintained for all Atlantic First Nations	Provides a singular point of contact for all participant Atlantic First Nation communities

Adhere to discharge standards for all Atlantic First Nations	Provides a singular point of contact for all participant Atlantic First Nation communities
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<b>AFNWA</b> - Board - Staff - System Operators
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Goal	How AFNWA supports
Provide local customers with safe drinking water and wastewater services.	<p>Implement consistent standards across all communities, upgrade and maintain systems to current and future standards, maintain relationships and contractual relationships with municipal water authorities (where applicable)</p> <p>Ensure AFNWA board has geographic representation.</p>
Receive support in resolving water and wastewater responsibilities for their communities	<p>Implement resolutions process, day-to-day maintenance and management of drinking water and wastewater systems,</p> <p>Ensure AFNWA board has geographic representation.</p>
Improve cultural awareness of the importance of water, and public involvement	<p>Implement a communications and outreach plan to educate communities</p> <p>Ensure AFNWA board has geographic representation.</p>
Meet proposed regulations and guidelines for drinking water and wastewater services	<p>Implement consistent standards across all communities, upgrade and maintain systems to current and future standards, maintain relationships and contractual relationships with municipal water authorities (where applicable). Build a singular point of contact with regulatory agencies. Advocate in the development of regulations and standards on behalf of Atlantic First Nations</p>
Incorporate Indigenous traditional knowledge	<p>Implement an Elders Council and engagement with Chiefs. Integrate engagement within Board decisions</p>
Support qualified and committed community water managers, operators and monitors	<p>Adopt a formal training and development program for all staff employed by the AFNWA. Implement strategies that recognize the experience and knowledge of staff currently employed in water and wastewater system operation and take a consistent approach to salaries, benefits, training and career development.</p>
Bring the current water and wastewater infrastructure assets up to a uniform standard state of repair across all communities	<p>Implement consistent standards across all communities, upgrade and maintain systems to current and future standards, maintain relationships and contractual relationships with municipal water authorities (where applicable). Build a singular point of contact with regulatory agencies. Advocate in the development of regulations and standards on behalf of Atlantic First Nations</p>
Proactively plan for growth in communities	<p>Implement a clear preference to hire from participating Atlantic First Nations.</p>
Build Atlantic First Nation expertise in the area of water and wastewater services	<p>Implement a clear preference to hire from participating Atlantic First Nations.</p>

Develop and strengthen relationship with committed and potential Atlantic First Nations communities	Engage communities in an open and transparent manner by developing and implementing a communication and outreach program.
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**Regional / Neighbouring Water and Wastewater Services / Authorities**

<b>Goal</b>	<b>How AFNWA supports</b>
(Municipal) Water Authorities generate revenue from the provision of water and wastewater to Atlantic First Nations through an MTA.	Engage communities in an open and transparent manner to determine effective and financially appropriate service delivery costs for Atlantic First Nations. Conduct scenario and financial analysis to confirm MTA value, and communicate benefits to Atlantic First Nations if an MTA is the preferred scenario
Ensure First Nations are clear on responsibilities of both parties in the MTA	Lead the identification of responsibilities for ongoing maintenance and repair, basis of cost, and means to dispute resolution may not be specified. Provide one singular point of contact to address and resolve agreement, or operations concerns.
Ensure MTA is competitive and fair	Due to the oversight of multiple MTA, AFNWA will be able to identify best practices and lessons learned from across the region. This will enable both parties to revise and execute improved MTA.

## Appendix 5 - Gender-Based Analysis (GBA+) Screening

Establishing the AFNWA as a permanent and independent water authority will impact a broad and diverse number of stakeholders. The following GBA+ analysis screening (Table 23) has been conducted to provide an initial assessment, and to ensure the recommended option:

- Supports gender equality and closes key gaps between diverse groups of women, men and non-binary people
- Ensures that the groups and people consulted adequately represent the women, men and non-binary people that will be affected by the organization
- Has examined the importance of reducing obstacles to the participation of woman, men and non-binary in the planned recommendation

**Issue:** Implementing an independent water authority for Atlantic First Nations will result in changes to training, career options, and changes to the delivery of participating on communities

Table 23 GBA+ Initial Screening

Consultation Objective	Target Client	How?	When?
Has the AFNWA taken steps to ensure the implementation and organization being recommended is culturally appropriate?	<ul style="list-style-type: none"> <li>• Atlantic First Nations Leadership (Chief, Formal Elected Council, Elders)</li> </ul>	<ul style="list-style-type: none"> <li>• Atlantic First Nations represented on Board of Directors</li> <li>• Elders Advisory committee</li> <li>• 2 Eyed Seeing policy</li> <li>• Engagement workshops to solicit understanding</li> </ul>	<ul style="list-style-type: none"> <li>• Develop of initial policies</li> <li>• Hiring requirement to inform CEO and Senior Management of cultural intent</li> <li>• Development of business plan</li> </ul>
	<ul style="list-style-type: none"> <li>• Federal, provincial and local government leaders</li> </ul>	<ul style="list-style-type: none"> <li>• Outreach programs</li> <li>• Informal meetings</li> <li>• Workshops</li> </ul>	<ul style="list-style-type: none"> <li>• Ongoing, incorporated as standing item on all conversations</li> </ul>
Has the AFNWA considered ways to increase youth/young adult participation in its workforce? (i.e.: many water operators are approaching retirement; many municipal water works are putting in place succession planning / youth outreach to promote the water operations field.	<ul style="list-style-type: none"> <li>• Youth 15+</li> <li>• Recent graduates</li> </ul>	<ul style="list-style-type: none"> <li>• Training</li> <li>• Targeted education</li> <li>• Career counselling</li> <li>• Outreach programs</li> <li>• Marketing and communications</li> <li>• Sponsor scholarships, co-op placements</li> </ul>	<ul style="list-style-type: none"> <li>• Implement regular communications with youth during academic year</li> <li>• Incorporation of operator training</li> </ul>
Has the AFNWA considered ways to	<ul style="list-style-type: none"> <li>• Young women aged 15-24</li> </ul>	<ul style="list-style-type: none"> <li>• Implement education training</li> </ul>	<ul style="list-style-type: none"> <li>• During the planning phase</li> </ul>

Consultation Objective	Target Client	How?	When?
<p>increase female participation in its workforce? (i.e.: women are very underrepresented in water operations careers)</p>	<ul style="list-style-type: none"> <li>• Women looking to upgrade skills / career changes</li> </ul>	<ul style="list-style-type: none"> <li>• Mentorship opportunities</li> <li>• Semi-structured discussion groups</li> </ul>	<ul style="list-style-type: none"> <li>• During implementation of the initiative</li> </ul>
	<ul style="list-style-type: none"> <li>• First Nation women</li> </ul>	<ul style="list-style-type: none"> <li>• Informal meetings</li> <li>• Job shadowing</li> <li>• Targeted marketing</li> <li>• Implement policy direction</li> </ul>	<ul style="list-style-type: none"> <li>• Operator training</li> <li>• Development of backup operator plans / contingency plans</li> </ul>
<p>Is the proposed organizational AFNWA structure easy to access, inclusive and open to the communities they serve?</p>	<ul style="list-style-type: none"> <li>• Seniors</li> </ul>	<ul style="list-style-type: none"> <li>• Provision of interpreters including oral and sign language, local dialect</li> </ul>	<ul style="list-style-type: none"> <li>• Compulsory training for AFNWA employees</li> <li>• Establishment of local hubs resources, access to provide broad services</li> <li>• Community communication plans</li> </ul>
	<ul style="list-style-type: none"> <li>• Persons with disabilities</li> </ul>	<ul style="list-style-type: none"> <li>• Implement accessibility considerations in all capital investments, marketing, and communications</li> </ul>	<ul style="list-style-type: none"> <li>• Compulsory training for AFNWA employees</li> <li>• Early identification of project requirements</li> <li>• Service reviews and plan development</li> </ul>
	<ul style="list-style-type: none"> <li>• Women, men and non-binary customers</li> </ul>	<ul style="list-style-type: none"> <li>• Develop and promote inclusive policies</li> <li>• Implement broad marketing messages</li> </ul>	<ul style="list-style-type: none"> <li>• Compulsory training for AFNWA employees</li> <li>• Implementation and engagement of senior management</li> <li>• Diverse policy development, target hiring practices</li> </ul>
	<ul style="list-style-type: none"> <li>• Language barriers</li> </ul>	<ul style="list-style-type: none"> <li>• Provision of interpreters including oral and sign language, local dialect</li> </ul>	<ul style="list-style-type: none"> <li>• Ensure hiring reflects diverse languages of Atlantic First Nations communities</li> </ul>
<p>Is the AFNWA culture supportive of a diverse population?</p>	<ul style="list-style-type: none"> <li>• All current and potential clients of the AFNWA</li> </ul>	<ul style="list-style-type: none"> <li>• Develop an implementation guide</li> </ul>	<ul style="list-style-type: none"> <li>• Initial hiring process and training</li> </ul>

## Appendix 6 – AFNWA Option Analysis

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### Viable Options

Identifying viable business model options to match the purpose, mission and structure of the AFNWA has been the result of years of effort by the Atlantic Policy Congress, and careful consideration by the Atlantic First Nations communities.<sup>78</sup> Through this work four potentially viable business models have been identified for the AFNWA. These options ranged from full-service provider to an oversight role with services contracted to an outside agency.

- Full Service Centralized (FSC)
- Full Service De-centralized (FSD)
- Full Outsource (FOS)
- Technical Services Support (TSS)

The FSC, FSD, FOS and TSS business models vary in their ability to meet the management structure, level of service, risk management considerations and aspirations to achieve self-determination and governance. Despite this variation, the FSC, FSD, FOS and TSS business models are organizationally structured around a Corporate Services Department, Communications Department, Operations Department and an Engineering Department.

A summary of each option and high-level pros and cons are based on research conducted by Halifax Water and Accelerator Inc., and stakeholder group consultants conducted by APC<sup>79</sup>. Conclusions and recommendations are also based on outreach activities, which included meetings and workshops with First Nations Chiefs, Elders and water system operators.<sup>80</sup>

### Full Service Centralized (FSC)

The Full Service – Centralized (FSC) organizes groups of people based on their specific expertise, and enables the management of staff, and their function through in-house employment.

The FSD model houses all AFNWA staff in a central corporate head office with the exception of operators who would be directly located in communities. Due to the diverse communities being serviced by AFNWA the central office would be positioned in a strategically central location, somewhere along the corridor between Moncton and Halifax. To maximize the community benefits and foster a deeper relationship with the AFNWA it is recommended that the head offices for all organizational models be located in Atlantic First Nation communities. This will further enable the incorporation of values and traditional knowledge of the communities served by the AFNWA.

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<sup>78</sup> Halifax Water and Accelerator Inc. “Corporate Structuring for Atlantic First Nations Water Authority.” August, 2017.  
, Halifax Water and Accelerator Inc. “Preliminary Fire Year Business Plan.” June, 2018.

<sup>79</sup> Refer to Appendix 11 for a list of key consultant reports

<sup>80</sup> Atlantic Policy Congress “APCs Clean Water Initiative’s (CWI) Atlantic First Nation Water Authority (AFNWA) Chronology.” 2016. Appendix C

Local operators would report to a superintendent of operations, located in the corporate head office. To ensure adequate support, operators would be cross trained to assist other communities' water and wastewater systems. Initially, additional staff may be required to operate systems in the recognition that existing operators receive additional training and/or certified in either water or wastewater operations. Routine monitoring and maintenance would be the responsibility of local operators but would contract out more complex maintenance requiring heavy equipment, or skills not resident in the local operator or department. The superintendent of technical services and two staff would be responsible for the SCADA and operational technology systems. They would be responsible to plan and oversee the development of a SCADA system across the entire service area while also assisting local operators with instrumentation, data management, configuration and control issues.

The AFNWA Engineering Department would have primary responsibility for the planning, construction and management of the utility's assets. Immediate responsibilities would include the assessment of current infrastructure needs and developing a program to deliver capital projects to upgrade service delivery across the service area of the AFNWA. This department would be responsible for capital project delivery, asset management, planning and development.

Initial analysis identifies the following pros and cons:

FSC Pros	FSC Cons
Efficient aggregation of expertise within each functional area.	Discontinuity between head office and communities
Limited duplication of roles	Challenge to provide prompt response time for issues or actions required from head office.
Simplistic management structure for accountability, reporting and communicating	Increased travel costs for operational response from head office
Waterstudies <sup>81</sup> report workshop results noted the, "in-house staffing approach was considered more desirable by industry and First Nation representatives"	

### Full Service De-centralized (FSD)

The Full Service – Decentralized (FSD) organizational structure allows some specific functions to be centralized at AFNWA headquarters while allow other functions to be decentralized to a regional level. Enabling decentralized functions allows the AFNWA structure to align its core competences with the needs of the customers in different geographic regions. This functional structure is often referred to as a "Hub and Spoke" model within the Canadian water and wastewater industry. Each regional centre would be sized and staffed to best align with the needs of that region and the specific communities being served. Both the head office and the regional centres may have staff that are aligned with each of the four core functional areas

<sup>81</sup> Gagnon, Graham. (March 2014). Waterstudies, Centre for Water Resources Studies (CWRS), Dalhousie University, Atlantic First Nations Water Authority Summary Report, Appendix A.

Under the FSD model, it is proposed that local community operations staff be organized around the following operational hubs (with the number of assigned communities)<sup>82</sup>.

- Cape Breton (Eskasoni, Potlotek, Membertou)
- Prince Edward Island (Lennox Island, Abegweit)
- New Brunswick West [Maliseet] (Oromocto, Tobique)
- New Brunswick East (Eel River Bar, Elsipogtog)
- Nova Scotia East - Millbrook, Sipekne'katik, Paqtnkek, Pictou Landing
- Nova Scotia West - Acadia, Glooscap

Establishing organizational hubs allows for the creation of specific centers of operational knowledge and expertise in areas close to several communities. Local hubs will be responsible to provide day to day operational decision making as they are the organizational unit closest to the communities being served and have the greatest understanding of the resources and operational knowledge specific to those systems. Decentralizing this level of decision-making authority will create a common mission among the operators serving around a hub, while still providing the flexibility to bring in resources from the main office or other service areas. The FSD model will also allow for more direct interaction with customers and foster relationships within the communities.

FSD Pros	FSD Cons
Optimizes response time for operations and maintenance activities	Coordination and consistency between regional offices
Focused relationship with community	Additional office costs – a series of parallel regional offices can introduce duplication of activities especially around support functions
Higher level of service	Higher staff costs with the introduction of front-line supervisors
Preferred option of the Atlantic First Nations	
Provides highest ability to establish operational knowledge and expertise close to communities	
Provides the highest ability to focus and foster relationships and connections with local communities	

### Full Outsource (FOS)

The Full Outsource (FOS) model provides one manager in each of the functional areas but follows a Public-Private Partnership or P3 model as it contracts out the remaining responsibilities

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<sup>82</sup> Halifax Water and Accelerator Inc. “Corporate Structuring for Atlantic First Nations Water Authority.” August, 2017. P.23

with a third party outside of the water authority. The FOS is similar to the FSC with the addition of multiple sub-contracts supplying all the resources within each functional area.

Under a FOS model, the AFNWA would be to manage the provision of services by the contracted entity and to manage the relationship between the communities and both the authority and the contracted agency. Under a P3 model, AFNWA would not have any operating staff but focus any staffing in the engineering and operations functional units to ensure that obligations related to the contracts are being met. If desired by the authority, the engineering functions of planning and development, asset management and capital project delivery could remain in house or be contracted out as well.

There is a risk in a FOS functional model that the authority will be unable to provide direct services to communities, and as a result be separated by a degree from the ability to make changes on the ground. Ensuring that the negotiated contract with the third-party agency meets the AFNWA desired outcomes will determine the ultimate success of the authority. Important considerations of the contract include determining which risks are transferred, how to measure performance, and what mechanisms will allow adjustments to be made if required. While an effective contract can be negotiated, the authority will need to ensure they can meet future challenges will be determined by the initial negotiated contract.

FOS Pros	FOS Cons
Risk transfer to third party	Waterstudies <sup>83</sup> report workshop results noted the, “in-house staffing approach was considered more desirable by industry and First Nation representatives”.
Fixed price contracts with more definitive construction schedule	Accountability for service still rests with water authority
	Loss of flexibility to address local community or customer concerns
	Once contracts established, very little flexibility to modify service in response to changing needs
	More expensive financing
	The legal costs under this approach are expected to be significantly higher.
	Atlantic First Nations least favourite option

## Technical Services Support (TSS)

The Technical Services Support (TSS) model enables an organization to act as a technical service provider directly with Atlantic First Nations communities with system ownership remaining with the community. This is a common model across Canada. While the actual operational staffing structure could resemble the FSC or FSD models discussed above, the TSS provides a

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<sup>83</sup> Gagnon, Graham. (March 2014). Waterstudies, Centre for Water Resources Studies (CWRS), Dalhousie University, Atlantic First Nations Water Authority Summary Report, Appendix A.

full series of services (across all four functional areas) direct to the communities on a contract basis. A community therefore has the independence to choose to utilize all or a subset of the available services as deemed to best fit their requirements.

The TSS model provides a similar range of services although this model presumes that the Atlantic First Nation community would retain asset ownership and allow them to use the AFNWA for a range of services if desired. Under this functional model it is anticipated that there would be some mid management level consolidation of duties which provide some timely and cost effectively service delivery improvements. The exact composition in this model would, however, be dependent on the level of service desired by an individual community.

TSS Pros	TSS Cons
Ownership stays with First Nation community – control of assets and finances.	Functional resource requirements may fluctuate with addition and deletion of various contracts
Community can add or delete range of services required – customized service delivery	Fluctuating resource requirements will make it difficult to attract and retain managers and qualified operators
Water authority is a simple service delivery model with no equity ownership	Ownership stays with First Nation community – liability of ownership also stays with community
	Reduced opportunity for consistent region wide service level and regulatory compliance.
	Operational synergy will be lost due to the disparity in levels of service
	Will not be able to negotiate for resources and federal funding as one voice for all First Nation communities
	Standardized approach to system design will be compromised

# Appendix 7 – Financial Summary of Participating Atlantic First Nations Communities with BCRs

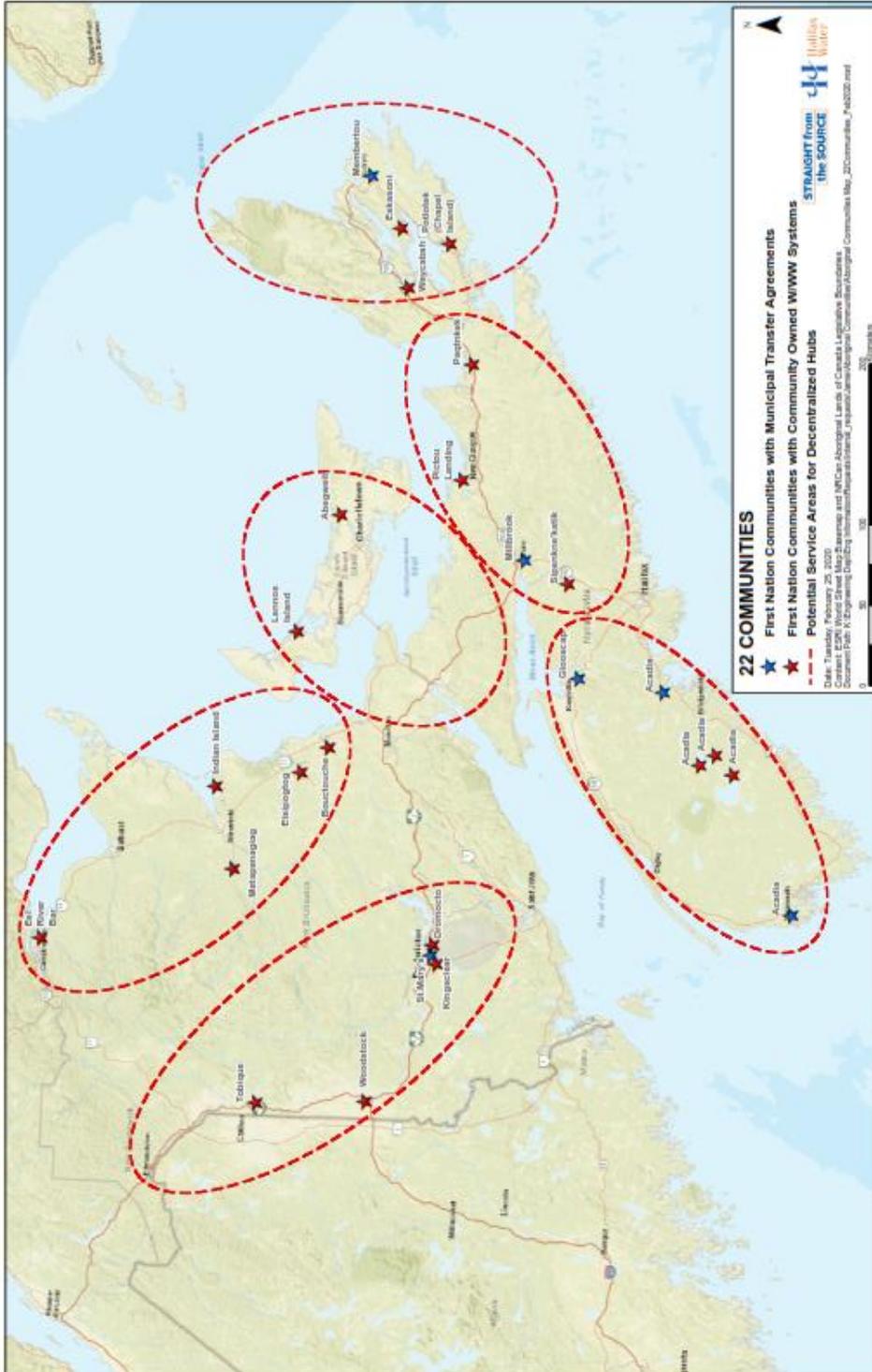
Financial Year	Total Years 1-25	2022/23	2023/24	2024/25	2025/26	2026/27	2027/28	2028/29	2029/30	2030/31	2031/32	2032/33	2033/34	2034/35	2035/36	2036/37	2037/38	2038/39	2039/40	2040/41	2041/42	2042/43	2043/44	2044/45	2045/46	2046/47
<b>Financial Summary</b>																										
<b>Profit and Loss</b>																										
Revenue - External Funding	110,629,012	3,086,386	3,148,282	3,211,248	3,275,473	3,340,982	3,407,985	3,476,145	3,545,668	3,616,581	3,689,111	3,762,893	3,838,151	3,914,914	3,993,427	4,073,295	4,154,761	4,237,856	4,322,846	4,409,303	4,497,489	4,587,439	4,679,439	4,773,027	4,868,488	4,965,858
Revenue - Operating	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cost of Sales	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
<b>Gross Margin</b>	<b>110,629,012</b>	<b>3,086,386</b>	<b>3,148,282</b>	<b>3,211,248</b>	<b>3,275,473</b>	<b>3,340,982</b>	<b>3,407,985</b>	<b>3,476,145</b>	<b>3,545,668</b>	<b>3,616,581</b>	<b>3,689,111</b>	<b>3,762,893</b>	<b>3,838,151</b>	<b>3,914,914</b>	<b>3,993,427</b>	<b>4,073,295</b>	<b>4,154,761</b>	<b>4,237,856</b>	<b>4,322,846</b>	<b>4,409,303</b>	<b>4,497,489</b>	<b>4,587,439</b>	<b>4,679,439</b>	<b>4,773,027</b>	<b>4,868,488</b>	<b>4,965,858</b>
<b>AFNWA structure</b>																										
Admin Department	(38,040,157)	(1,187,400)	(1,211,213)	(1,235,437)	(1,260,146)	(1,285,349)	(1,311,126)	(1,337,349)	(1,364,096)	(1,391,378)	(1,419,281)	(1,447,667)	(1,476,620)	(1,506,153)	(1,536,358)	(1,567,086)	(1,598,427)	(1,630,396)	(1,663,093)	(1,696,355)	(1,730,282)	(1,764,888)	(1,800,282)	(1,836,288)	(1,873,014)	(1,910,474)
Corporate Services Department	(28,572,834)	(891,883)	(909,770)	(927,965)	(946,524)	(965,455)	(984,817)	(1,004,513)	(1,024,604)	(1,045,096)	(1,066,055)	(1,087,376)	(1,109,123)	(1,131,306)	(1,153,994)	(1,177,074)	(1,200,615)	(1,224,628)	(1,249,187)	(1,274,171)	(1,299,655)	(1,325,648)	(1,352,233)	(1,379,278)	(1,406,863)	(1,435,001)
Communications Department	(9,385,237)	(292,954)	(298,829)	(304,806)	(310,902)	(317,120)	(323,480)	(329,950)	(336,549)	(343,280)	(350,164)	(357,167)	(364,311)	(371,597)	(379,049)	(386,630)	(394,363)	(402,250)	(410,317)	(418,523)	(426,894)	(435,432)	(444,164)	(453,047)	(462,108)	(471,351)
Operations Department	(63,465,540)	(1,981,037)	(2,020,767)	(2,061,182)	(2,102,406)	(2,144,454)	(2,187,460)	(2,231,210)	(2,275,834)	(2,321,350)	(2,367,905)	(2,415,263)	(2,463,568)	(2,512,839)	(2,563,234)	(2,614,498)	(2,666,788)	(2,720,124)	(2,774,676)	(2,830,169)	(2,886,773)	(2,944,508)	(3,003,560)	(3,063,631)	(3,124,903)	(3,187,401)
Engineering Department	(17,936,232)	(559,868)	(571,096)	(582,518)	(594,169)	(606,052)	(618,206)	(630,570)	(643,182)	(656,045)	(669,202)	(682,586)	(696,238)	(710,163)	(724,405)	(738,893)	(753,671)	(768,744)	(784,161)	(799,845)	(815,842)	(832,158)	(848,847)	(865,824)	(883,141)	(900,803)
AFNWA Board costs	(8,669,805)	(270,823)	(276,050)	(281,571)	(287,202)	(292,946)	(298,821)	(304,798)	(310,894)	(317,112)	(323,471)	(329,941)	(336,539)	(343,270)	(350,154)	(357,157)	(364,301)	(371,587)	(379,039)	(386,620)	(394,352)	(402,239)	(410,306)	(418,512)	(426,882)	(435,420)
One Time Start Up Costs	(52,018,831)	(1,623,735)	(1,656,299)	(1,689,425)	(1,723,214)	(1,757,678)	(1,792,928)	(1,828,786)	(1,865,362)	(1,902,669)	(1,940,827)	(1,979,643)	(2,019,236)	(2,059,621)	(2,100,926)	(2,142,945)	(2,185,804)	(2,229,520)	(2,274,232)	(2,319,717)	(2,366,111)	(2,413,434)	(2,461,835)	(2,511,071)	(2,561,293)	(2,612,519)
Community Systems O&M plus MTA costs	(110,973,506)	(3,463,969)	(3,533,438)	(3,604,107)	(3,676,189)	(3,749,713)	(3,824,913)	(3,901,411)	(3,979,439)	(4,059,028)	(4,140,431)	(4,223,239)	(4,307,704)	(4,393,858)	(4,481,976)	(4,571,616)	(4,663,048)	(4,756,309)	(4,851,696)	(4,948,730)	(5,047,704)	(5,148,658)	(5,251,914)	(5,356,952)	(5,464,091)	(5,573,373)
Testing program	(104,037,662)	(3,247,471)	(3,312,598)	(3,378,850)	(3,446,427)	(3,515,356)	(3,585,856)	(3,657,573)	(3,730,724)	(3,805,339)	(3,881,654)	(3,959,287)	(4,038,473)	(4,119,242)	(4,201,853)	(4,285,890)	(4,371,608)	(4,459,040)	(4,548,465)	(4,639,434)	(4,732,223)	(4,826,867)	(4,923,669)	(5,022,142)	(5,122,585)	(5,225,037)
Integrated Resource Plan	(8,155,835)	-	-	-	(3,000,000)	-	-	-	-	(1,104,140)	-	-	-	-	(1,219,191)	-	-	-	-	(1,346,158)	-	-	-	-	(1,486,347)	-
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Total operating expenses	(441,255,639)	(13,518,941)	(13,790,061)	(14,065,862)	(17,347,179)	(14,634,123)	(14,927,607)	(15,226,159)	(15,530,682)	(16,945,436)	(16,158,990)	(16,482,170)	(16,811,813)	(17,148,049)	(18,711,141)	(17,841,789)	(18,198,625)	(18,562,597)	(18,934,866)	(20,659,721)	(19,699,835)	(20,093,832)	(20,496,809)	(20,906,746)	(22,811,227)	(21,751,378)
<b>EBITDA</b>	<b>(330,626,626)</b>	<b>(10,432,556)</b>	<b>(10,641,778)</b>	<b>(10,854,614)</b>	<b>(14,071,706)</b>	<b>(11,293,140)</b>	<b>(11,519,622)</b>	<b>(11,750,014)</b>	<b>(11,985,015)</b>	<b>(13,328,855)</b>	<b>(12,469,879)</b>	<b>(12,719,277)</b>	<b>(12,973,662)</b>	<b>(13,233,135)</b>	<b>(14,717,714)</b>	<b>(13,768,494)</b>	<b>(14,043,864)</b>	<b>(14,324,741)</b>	<b>(14,612,021)</b>	<b>(16,250,419)</b>	<b>(15,202,346)</b>	<b>(15,506,393)</b>	<b>(15,817,371)</b>	<b>(16,133,718)</b>	<b>(17,942,739)</b>	<b>(16,785,520)</b>
Depreciation and Amortization	(54,396,722)	-	(179,495)	(358,941)	(612,531)	(866,151)	(1,119,908)	(1,373,926)	(1,601,451)	(1,829,438)	(2,057,986)	(2,287,206)	(2,517,182)	(2,800,455)	(2,684,826)	(2,770,334)	(2,857,001)	(2,944,856)	(3,033,933)	(3,124,269)	(3,215,891)	(3,308,830)	(3,124,269)	(3,215,891)	(3,308,830)	(3,403,121)
<b>EBIT</b>	<b>(385,023,348)</b>	<b>(10,432,556)</b>	<b>(10,821,274)</b>	<b>(11,213,555)</b>	<b>(14,684,238)</b>	<b>(12,159,291)</b>	<b>(12,639,530)</b>	<b>(13,123,941)</b>	<b>(13,586,465)</b>	<b>(15,158,293)</b>	<b>(14,527,865)</b>	<b>(15,006,483)</b>	<b>(15,490,844)</b>	<b>(15,833,590)</b>	<b>(17,402,540)</b>	<b>(16,538,828)</b>	<b>(16,900,864)</b>	<b>(17,269,597)</b>	<b>(17,645,953)</b>	<b>(19,374,688)</b>	<b>(18,418,237)</b>	<b>(18,815,223)</b>	<b>(18,941,640)</b>	<b>(19,349,609)</b>	<b>(21,251,569)</b>	<b>(20,188,641)</b>
<b>Operating Profit / (Loss)</b>	<b>(385,023,348)</b>	<b>(10,432,556)</b>	<b>(10,821,274)</b>	<b>(11,213,555)</b>	<b>(14,684,238)</b>	<b>(12,159,291)</b>	<b>(12,639,530)</b>	<b>(13,123,941)</b>	<b>(13,586,465)</b>	<b>(15,158,293)</b>	<b>(14,527,865)</b>	<b>(15,006,483)</b>	<b>(15,490,844)</b>	<b>(15,833,590)</b>	<b>(17,402,540)</b>	<b>(16,538,828)</b>	<b>(16,900,864)</b>	<b>(17,269,597)</b>	<b>(17,645,953)</b>	<b>(19,374,688)</b>	<b>(18,418,237)</b>	<b>(18,815,223)</b>	<b>(18,941,640)</b>	<b>(19,349,609)</b>	<b>(21,251,569)</b>	<b>(20,188,641)</b>
<b>Cash Flow</b>																										
EBITDA	(330,626,626)	(10,432,556)	(10,641,778)	(10,854,614)	(14,071,706)	(11,293,140)	(11,519,622)	(11,750,014)	(11,985,015)	(13,328,855)	(12,469,879)	(12,719,277)	(12,973,662)	(13,233,135)	(14,717,714)	(13,768,494)	(14,043,864)	(14,324,741)	(14,612,021)	(16,250,419)	(15,202,346)	(15,506,393)	(15,817,371)	(16,133,718)	(17,942,739)	(16,785,520)
<b>Capital Expenditure - Participating Communities</b>																										
Water Treatment	(4,402,576)	(415,460)	(423,792)	(864,535)	(881,826)	(899,462)	(917,501)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Water Distribution	(4,230,544)	(189,544)	(193,345)	(394,424)	(402,313)	(410,359)	(418,589)	(426,961)	(435,500)	(444,210)	(453,118)	(462,181)	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Wastewater Collection	(20,421,860)	(914,975)	(933,325)	(1,903,982)	(1,942,062)	(1,980,903)	(2,020,630)	(2,061,042)	(2,102,263)	(2,144,308)	(2,187,312)	(2,231,058)	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Wastewater Treatment	(23,392,422)	(1,048,067)	(1,069,086)	(2,180,935)	(2,224,554)	(2,269,045)	(2,314,550)	(2,360,841)	(2,408,058)	(2,456,219)	(2,505,478)	(2,555,588)	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total capital expenditure	(52,447,402)	(2,568,046)	(2,619,548)	(5,343,877)	(5,450,754)	(5,559,770)	(5,671,270)	(4,848,844)	(4,945,821)	(5,044,737)	(5,145,909)	(5,248,827)	-	-	-	-	-	-	-	-	-	-	-	-	-	-
<b>Lifecycle Capital Maintenance Expenditure - Participating Communities</b>																										
Annual Asset Renewal	(171,444,010)	(5,412,452)	(5,520,997)	(5,631,417)	(5,744,045)	(5,858,926)	(5,976,426)	(6,095,954)	(6,217,874)	(6,342,231)	(6,469,423)	(6,598,812)	(6,730,788)	(6,865,404)	(7,003,088)	(7,143,150)	(7,286,013)	(7,431,733)	(7,580,775)	(7,732,390)	(7,887,038)	(8,044,779)	(7,732,806)	(7,887,038)	(8,044,779)	(8,205,674)
Total	(171,444,010)	(5,412,452)	(5,520,997)	(5,631,417)	(5,744,045)	(5,858,926)	(5,976,426)	(6,095,954)	(6,217,874)	(6,342,231)	(6,469,423)	(6,598,812)	(6,730,788)	(6,865,404)	(7,003,088)	(7,143,150)	(7,286,013)	(7,431,733)	(7,580,775)	(7,732,390)	(7,887,038)	(8,044,779)	(7,732,806)	(7,887,038)	(8,044,779)	(8,205,674)
<b>Net Cash Flow</b>	<b>(554,518,037)</b>	<b>(18,413,053)</b>	<b>(18,782,323)</b>	<b>(21,829,908)</b>	<b>(25,266,506)</b>	<b>(22,711,836)</b>	<b>(23,167,317)</b>	<b>(22,694,813)</b>	<b>(23,148,709)</b>	<b>(24,715,823)</b>	<b>(24,085,211)</b>	<b>(24,566,915)</b>	<b>(19,704,450)</b>	<b>(20,098,539)</b>	<b>(21,720,802)</b>	<b>(20,911,643)</b>	<b>(21,329,876)</b>	<b>(21,756,474)</b>	<b>(22,192,795)</b>	<b>(23,982,809)</b>	<b>(23,089,384)</b>	<b>(23,551,172)</b>	<b>(23,550,176)</b>	<b>(24,020,756)</b>	<b>(25,987,518)</b>	<b>(24,991,195)</b>
<b>Cash Account</b>																										
Cash Balance b/f	11,751,966	(6,661,087)	(25,443,410)	(47,273,318)	(72,539,824)	(95,251,660)	(118,418,978)	(141,113,791)	(164,262,500)	(188,978,323)	(213,063,534)	(237,630,449)	(257,334,899)	(277,433,438)	(299,154,240)	(320,065,883)	(341,395,759)	(363,152,233)	(385,345,028)	(409,327,837)	(432,417,221)	(455,968,393)	(479,518,569)	(503,539,325)	(529,526,843)	
Net Cash Flow	(18,413,053)	(18,782,323)	(21,829,908)	(25,266,506)	(22,711,836)	(23,167,317)	(22,694,813)	(23,148,709)	(24,715,823)	(24,085,211)	(24,566,915)	(19,704,450)	(20,098,539)	(21,720,802)	(20,911,643)	(21,329,876)	(21,756,474)	(22,192,795)	(23,982,809)	(23,089,384)	(23,551,172)	(23,550,176)	(24,02			

## Appendix 8 – Required Capital Expenses by Participating Community

Member Community	Water Treatment	Water Distribution	Wastewater Collection	Wastewater Treatment	Total
<b>Elsipogtog First Nation</b>	\$607,000	\$703,000	\$4,774,000	\$2,459,000	\$8,543,000
<b>Tobique</b>	\$99,000	\$105,000	\$1,539,000	\$2,623,000	\$4,366,000
<b>Eskasoni</b>	\$246,000	\$1,137,000	\$5,149,000	\$9,321,000	\$15,853,000
<b>Paqtneq Mi'kmaw First Nation</b>	\$361,000	\$0	\$1,828,000	\$2,664,000	\$4,853,000
<b>Pictou Landing First Nation</b>	\$2,270,000	\$612,000	\$768,000	\$476,000	\$4,126,000
<b>Potlotek First Nation</b>	\$0	\$0	\$569,000	\$943,000	\$1,512,000
<b>Sipekne'katik Indian Brook</b>	\$255,000	\$857,000	\$1,674,000	\$140,000	\$2,926,000
<b>Abegweit</b>	\$0	\$88,000	\$79,000	\$0	\$167,000
<b>Lennox Island</b>	\$0	\$0	\$525,000	\$738,000	\$1,263,000
<b>Eel River Bar First Nation</b>	\$0	\$0	\$0	\$0	\$0
<b>Acadia</b>	\$0	\$0	\$0	\$0	\$0
<b>Glooscap First Nation</b>	\$0	\$0	\$0	\$0	\$0
<b>Membertou</b>	\$0	\$0	\$0	\$0	\$0
<b>Millbrook First Nation</b>	\$0	\$0	\$0	\$0	\$0
<b>Oromocto First Nation</b>	\$0	\$0	\$0	\$0	\$0
<b>Total</b>	<b>\$3,838,000</b>	<b>\$3,502,000</b>	<b>\$16,905,000</b>	<b>\$738,000</b>	<b>\$43,609,000</b>

# Appendix 9 – AFNWA Hub and Spoke Modification to Accommodate Future Community Interest

FSD Hub and Spoke Modification to Accommodate 22 Atlantic First Nation communities





## Appendix 10 - Risk Register

Developed through a risk workshop with senior ISC and APC leadership, the following identifies the highest risks, their probability and impact of each risk, and the appropriate risk management plan. The key risk events and corresponding planned risk responses relative to the implementation of the AFNWA are summarized below:

Table 19 Risk Factors

Risk Factors	Risk Response / Action
Corporate policies, procedures and by-laws are not ready in time for AFNWA operations (and their legal commitment to delivery water and wastewater services).	<ul style="list-style-type: none"> <li>• CEO and initial management team develops a detailed implementation plan that addresses the sequencing the management activities required to developing policies, procedures and by-laws</li> <li>• CEO and initial management team recruits, hires or procures the resources to develop the policies, procedures and by-laws</li> <li>• core capital,</li> </ul>
Significant unplanned operations or capital costs are incurred during the AFNWA in the early years	<ul style="list-style-type: none"> <li>• Develop detailed operations plan within years 1 and 2 of AFNWA operations</li> <li>• Develop detailed asset management plan within 2 years of AFNWA operations</li> <li>• Develop a 10-year capital program based on the asset management plan</li> </ul>
Challenge of AFNWA operations to meet regulatory standards	<ul style="list-style-type: none"> <li>• Develop and implement standard testing program to ensure operations meet regulatory standards</li> <li>• Implement a risk management approach towards AFNWA operations</li> <li>• Implement change management with current operators on the need and importance of the adopted regulations and standards</li> <li>• Assess knowledge, skills and competency of current operators and then enlist (as required) water and wastewater operators into accredited/certified/recognized operator training program</li> <li>• Implement onsite mentorship and career development strategies to continuously improve operator knowledge, skills and reduce risk</li> <li>• Engage external consultants to provide operator support (as required)</li> </ul>
Lack of Government of Canada support for full handover of oversight and authority to the AFNWA to provide and maintain water and wastewater services and infrastructure	<ul style="list-style-type: none"> <li>• Ensure AFNWA has the approved mandate and authority to oversee participating Atlantic First Nations communities</li> <li>• Secure 25-year, long-term federal funding agreement to ensure self-governance can be established</li> <li>• Early agreement of 10-year asset management and capital plan</li> <li>• Stage capital investments to address manageable risks</li> <li>• Accelerate asset management planning, implement rigorous capital planning process to prioritize projects</li> </ul>

Risk Factors	Risk Response / Action
Lack of experienced capital project management and asset management staff, and / or technical information result in delay to improve, replace or expand infrastructure	<ul style="list-style-type: none"> <li>• Establish Project Management processes and Procedures based upon best practice.</li> <li>• Ensure asset management and procurement policies are in place based upon best practice.</li> <li>• Accelerate recruitment and retention strategy to secure qualified staff</li> <li>• Procure interim project and asset management resources during implementation phase to support AFNWA staff</li> <li>• Interim resources develop asset management and capital project plans to include tasks, responsibilities and an implementation timeline</li> <li>• ISC or other Agencies /Consultants to provide technical asset management assistance as required to develop the asset and capital plans</li> </ul>
Change management is not implemented in coordination with the establishment of the AFNWA.	<ul style="list-style-type: none"> <li>• Appoint a dedicated AFNWA change management team to develop a change management plan/strategy</li> <li>• Management team to develop a change management strategy.</li> <li>• Ensure Change Management Strategy is approved by the Board and Elders Council</li> <li>• Ensure that the Approved change management strategy/plan is implemented.</li> <li>• Establish a contingency and management reserve to address emergencies</li> <li>• Align the communications and change management strategies to ensure effective engagement and support.</li> </ul>
Lack of long-term federal funding leaves AFNWA with legal commitments without funding availability	<ul style="list-style-type: none"> <li>• Stage capital investments to address manageable risks</li> <li>• Secure long term, 25 year, operating and capital funding commitment from Government of Canada</li> </ul>
Potential that infrastructure costs exceed the AFNWA funding availability resulting in the inability to meet regulation and provide safe water and wastewater services to Atlantic First Nations communities.	<ul style="list-style-type: none"> <li>• Phase investment into discrete stages.</li> <li>• Develop a 25-year IRP after 3 years of operation.</li> <li>• Work with other First Nations Groups and Government departments to identify project funding sources that allow project to be implemented earlier than regular funding allows.</li> </ul>
Federal funding is insufficient to address operating and capital AFNWA commitments to Atlantic First Nations communities.	<ul style="list-style-type: none"> <li>• Implement a staged start up and funding plan over first 10 years of operations</li> <li>• Implement funding mechanisms that enable additional capital funding to be released based on revised asset management plans</li> <li>• Establish annual funding review and adjustment process that evaluates short and medium term operating and capital needs</li> <li>• Require AFNWA management to develop annual operating and capital budget plan.</li> <li>• Establish contingency reserve to accommodate larger operating or capital funding needs.</li> </ul>

Risk Factors	Risk Response / Action
Legal disagreement over the transfer of Land and assets to the AFNWA	<ul style="list-style-type: none"> <li>Operate facilities under a license or lease agreement.</li> </ul>

This following information provides a detailed risk assessment that will require ongoing monitoring, control and evaluation to ensure the successful implementation and establishment of the AFNWA.

Risk Factors	Probability	Impact	Risk Owner	Risk Response / Action
<b>1. Meeting Regulatory Compliance</b>				
1. Inability of Government of Canada to identify the regulator who will provide oversight to AFNWA and / or implement a multi-stakeholder regulator.	L	M		<ul style="list-style-type: none"> <li>ISC and APC to proactively develop a regulatory recommendation complete with roles and responsibilities</li> <li>Appoint a federal agency to provide the regulatory oversight role for quality standards as First Nation communities fall under federal jurisdiction</li> </ul>
2. Risk 1 extends to the appointment of a Business Regulator	M	M		<ul style="list-style-type: none"> <li>GOC to appoint a Business Regulator. ISC might carry out the role in the interim but an independent Business Regulator is recommended as a permanent solution.</li> <li>Establish operating policies, procedures and by-laws</li> <li>Establish a contingency and management reserve to address emergencies</li> </ul>
3. Establishing regulatory oversight (whether provincial/federal regulatory body) is not completed prior to AFNWA operations (i.e. unanticipated time requirements to establish, significant stakeholder engagement, AFNWA management input).	M	M		<ul style="list-style-type: none"> <li>Identify specific regulations, standard that the AFNWA will adhere to prior to funding approval (CWRS, Federal MWER)</li> </ul>

Risk Factors	Probability	Impact	Risk Owner	Risk Response / Action
4. Regulatory standards that are implemented by the regulator are not enforceable, or lack commonality amongst peers and other jurisdictions	L	M		<ul style="list-style-type: none"> <li>Ensure AFNWA participation in regulatory development and approval</li> <li>Ensure regulator has the appropriate level of legal oversight (i.e. Federal)</li> </ul>
5. Significant unplanned operations or capital costs are incurred during the AFNWA early years in the early years	H	H		<ul style="list-style-type: none"> <li>Develop detailed operations plan within years 1 and 2 of AFNWA operations</li> <li>Develop detailed asset management plan within years 1, 2 of AFNWA operations</li> <li>Develop a 10-year capital program based on the asset management plan</li> </ul>
6. AFNWA does not receive the authority to mandate regulatory compliance for AFN	L	H		<ul style="list-style-type: none"> <li>Identify and secure key agreements required prior to assuming responsibilities / operations of the AFNWA</li> <li>Government of Canada appoints regulators to administer regulatory standards and provide business oversight.</li> </ul>

## 2. Staff and Training

7. Challenge of AFNWA operations to meet regulatory standards	M	H		<ul style="list-style-type: none"> <li>Develop and implement standard testing program to ensure operations meet regulatory standards</li> <li>Implement a risk management approach towards AFNWA operations</li> <li>Implement change management with current operators on the need and importance of the adopted regulations and standards</li> <li>Assess knowledge, skills and competency of current operators and then enlist (as required) water and wastewater operators into accredited/certified/recognized operator training program</li> <li>Implement onsite mentorship and career development strategies to continuously improve operator knowledge, skills and reduce risk</li> <li>Engage external consultants to provide operator support (as required)</li> <li>Retain existing operations staff who are certified. Conduct an inventory</li> </ul>
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Risk Factors	Probability	Impact	Risk Owner	Risk Response / Action
				<p>of training levels, and leverage staff to assist across multiple systems (manage operational risk). Draw on existing training programs such as Circuit Rider Training Program to build AFNWA workforce.</p> <ul style="list-style-type: none"> <li>• During startup, implement a broad operating environment which shares resources with the focus on early risk identification and management</li> <li>•</li> </ul>
8. Operators are not all certified, several existing operators are not taking certification, and, in some cases, there are literacy issues	M	M		<ul style="list-style-type: none"> <li>• HR plan to be developed in first year of operation.</li> <li>• Implement HR plan in year 2 of operation.</li> <li>• Assessment of the maturity of existing staff</li> <li>• Where necessary recruit new staff.</li> <li>• Seek partnerships with First Nations educational Institutions and Colleges, Universities and local municipalities.</li> </ul>
9. Training operators could be both costly and time consuming	M	H		<ul style="list-style-type: none"> <li>• Budget for assessing operator knowledge/skills/competency and training of water and wastewater operators through accredited/certified/recognized operator training program</li> </ul>
10. Communities have insufficient resources, training and back up / redundancy in the systems	M	H		<ul style="list-style-type: none"> <li>• Develop an operations plan to ensure redundancy and cross training between Atlantic First Nations operators</li> </ul>
11. Lack of experienced operations staff result in inability to meet water and wastewater quality standards as AFNWA begins operations	M	H		<ul style="list-style-type: none"> <li>• Implement onsite mentorship and career development strategies to continuously improve operator knowledge and skills to reduce risk</li> <li>• Engage external consultants to provide operator support (as required)</li> <li>• Verify whether an accredited/certified/recognized operator training program can provide onsite training</li> <li>• Rotate training and operators to offset training schedule</li> </ul>
12. Lack of qualified candidates to fill	L	M		<ul style="list-style-type: none"> <li>• CEO secures or procures resources to develop a phased recruitment and hiring strategy to secure qualified staff</li> </ul>

Risk Factors	Probability	Impact	Risk Owner	Risk Response / Action
AFNWA staff and operator positions				<ul style="list-style-type: none"> <li>Recruitment and hiring strategy integrate: <ul style="list-style-type: none"> <li>use of on the site training and collaboration with local educational facilities</li> <li>use of limited term positions to fill immediate need while training is provided</li> </ul> </li> <li>Procure interim project and asset management resources during implementation phase to support AFNWA staff</li> </ul>

### 3. Demographic and Geographic Factors

13. Challenges in providing a uniform level of service and equity between geographically dispersed communities.	M	M		<ul style="list-style-type: none"> <li>Introduce a Supervisory Control and Data Acquisition (SCADA) system.</li> <li>Develop SOPs within years 1 -2</li> <li>Develop an Integrated resource plan after 3 years of operation.</li> <li>Develop an emergency management plan at corporate and local level.</li> </ul>
14. Geographic logistical challenges impact service, engineering and operations quality, responsiveness and meeting of regulatory standards	M	M		<ul style="list-style-type: none"> <li>Ensure Supervisors, Operators and Technical Services Technologists are regionally based and provided with transportation on-demand</li> <li>Implement recommended Hub and Spoke model.</li> </ul>
15. Higher than anticipated population growth within member communities	M	M		<ul style="list-style-type: none"> <li>Implement a community census and analyze to track AFNWA member community demographics</li> <li>Adjust asset management and operations plans according to member community growth projections</li> </ul>

### 4. Implementation

16. Corporate policies, procedures and by-laws are not ready in time for AFNWA operations (and their legal commitment to delivery water and wastewater services.	H	H		<ul style="list-style-type: none"> <li>CEO and initial management team develops a detailed implementation plan that addresses the sequencing the management activities required to developing policies, procedures and by-laws</li> <li>CEO and initial management team recruits, hires or procures the resources to develop the policies, procedures and by-laws</li> <li>core capital,</li> </ul>
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Risk Factors	Probability	Impact	Risk Owner	Risk Response / Action
17. AFNWA commences service delivery before key staff are in place.	M	H		<ul style="list-style-type: none"> <li>Develop the human resourcing plan, process for salaries, benefits, training etc., appropriate financial reporting and management reporting.</li> <li>Transfer assets and personnel on the same effective date.</li> </ul>
<b>5. Scalability</b>				
18. Additional communities sign-on as members after the AFNWA begins operations	M	M		<ul style="list-style-type: none"> <li>AFNWA management team develops a viability assessment and “intake” process for integrating additional communities</li> <li>Implement the Hub and spoke staffing to facilitate future communities to participate in the AFNWA to optimize staffing levels.</li> </ul>
19. Communities opting out as members after the AFNWA during operational stage	M	M		
<b>6. Self-Determination, Self-Government, Culture</b>				
20. Lack of Government of Canada support for full handover of oversight and authority to the AFNWA to provide and maintain water and wastewater services and infrastructure	M	H		<ul style="list-style-type: none"> <li>Ensure AFNWA has the approved mandate and authority to oversee participating Atlantic First Nations communities</li> <li>Secure 25-year, long-term federal funding agreement to ensure self-governance can be established</li> <li>Early agreement of 10-year asset management and capital plan</li> <li>Stage capital investments to address manageable risks</li> <li>Accelerate asset management planning, implement rigorous capital planning process to prioritize projects</li> </ul>
21. Atlantic First Nations communities do not perceive any additional improvement in water and wastewater services	H	L		<ul style="list-style-type: none"> <li>Document pre-AFNWA water and wastewater performance and implement regular reporting to Atlantic First Nations communities on performance</li> </ul>
<b>7. Capital Projects</b>				
22. Costs of infrastructure exceed AFNWA funding levels	M	H		<ul style="list-style-type: none"> <li>Develop a 25-year IRP Plan.</li> <li>Accelerate asset management planning to proactively identify high risk infrastructure</li> <li>Phase capital investment across communities based on risk</li> </ul>

Risk Factors	Probability	Impact	Risk Owner	Risk Response / Action
<p>23. Lack of experienced capital project management and asset management staff, and / or technical information result in delay to improve, replace or expand infrastructure</p>	M	H		<ul style="list-style-type: none"> <li>• Develop an Emergency Management Plan</li> <li>• Establish Project Management processes and Procedures based upon best practice.</li> <li>• Ensure asset management and procurement policies are in place based upon best practice.</li> <li>• Accelerate recruitment and retention strategy to secure qualified staff</li> <li>• Procure interim project and asset management resources during implementation phase to support AFNWA staff</li> <li>• Interim resources develop asset management and capital project plans to include tasks, responsibilities and an implementation timeline</li> <li>• ISC or other Agencies /Consultants to provide technical asset management assistance as required to develop the asset and capital plans</li> </ul>
8. Managing Change				
<p>24. Change management is not implemented in coordination with the establishment of the AFNWA.</p>	M	H		<ul style="list-style-type: none"> <li>• Appoint a dedicated AFNWA change management team to develop a change management plan/strategy</li> <li>• Management team to develop a change management strategy.</li> <li>• Ensure Change Management Strategy is approved by the Board and Elders Council</li> <li>• Ensure that the Approved change management strategy/plan is implemented.</li> <li>• Establish a contingency and management reserve to address emergencies</li> <li>• Align the communications and change management strategies to ensure effective engagement and support.</li> </ul>
<p>25. Lack of coordinated and unified communication with participating Atlantic First</p>	M	M		<ul style="list-style-type: none"> <li>• Implement community specific and AFNWA wide communication strategies</li> </ul>

Risk Factors	Probability	Impact	Risk Owner	Risk Response / Action
Nations communities				
26. AFNWA is the appropriate organization, and structure to deliver self-determination, self-government and financial independence.	L	M		<ul style="list-style-type: none"> <li>Implement regular internal and technical, and financial reviews to ensure alignment to the aspirations of AFNWA</li> <li>Ensure Federal and AFNWA policies and structure can accommodate improvements as required</li> </ul>
27. Atlantic First Nations culture refuses common water authority structure post agreement	L	L		<ul style="list-style-type: none"> <li>Ensure spiritual and cultural considerations are embedded in AFNWA governance and operations</li> </ul>
28. Atlantic First Nations perceive different levels of service from AFNWA	L	L		<ul style="list-style-type: none"> <li>Provide system wide and community specific performance reports, include financial reporting</li> </ul>

## 9. Funding

29. Lack of long-term federal funding leaves AFNWA will legal commitments without funding availability	M	H		<ul style="list-style-type: none"> <li>Stage capital investments to address manageable risks</li> <li>Secure long term, 25 year, operating and capital funding commitment from Government of Canada</li> <li>Implement AFNWA system wide program funding to offset temporary funding shortfall from individual bands and smooth out funding cash flow irregularities</li> </ul>
30. Potential that infrastructure costs exceed the AFNWA funding availability resulting in the inability to meet regulation and provide safe water and wastewater services to Atlantic First Nations communities.	M	H		<ul style="list-style-type: none"> <li>Phase investment into discrete stages.</li> <li>Develop a 25-year IRP after 3 years of operation.</li> <li>Work with other First Nations Groups and Government departments to identify project funding sources that allow project to be implemented earlier than regular funding allows.</li> </ul>
31. Change of Government of Canada changes policy direction, funding availability	M	M		<ul style="list-style-type: none"> <li>Secure long-term federal funding prior to Fall 2019 election</li> <li>Gather support from stakeholders</li> <li>Continue communications plan with all levels of government, and identified stakeholders</li> </ul>

Risk Factors	Probability	Impact	Risk Owner	Risk Response / Action
and political support				
32. Federal funding is insufficient to address operating and capital AFNWA commitments to Atlantic First Nations communities.	M	H		<ul style="list-style-type: none"> <li>• Implement a staged start up and funding plan over first 10 years of operations</li> <li>• Implement funding mechanisms that enable additional capital funding to be released based on revised asset management plans</li> <li>• Establish annual funding review and adjustment process that evaluates short and medium term operating and capital needs</li> <li>• Require AFNWA management to develop annual operating and capital budget plan.</li> <li>• Establish contingency reserve to accommodate larger operating or capital funding needs.</li> </ul>
<b>10. Legal</b>				
33. Legal disagreement over the transfer of Land and assets to the AFNWA	M	H		<ul style="list-style-type: none"> <li>• Operate facilities under a license or lease agreement.</li> </ul>
34. Government of Canada is only offering a standard form license with respect to new infrastructure and existing/upgraded infrastructure as opposed to ownership or lease, i.e. AFNWA will not have exclusive possession legally to its assets on site	M	M		<ul style="list-style-type: none"> <li>• AFNWA has reviewed federal government standard form license agreement which has been used for material infrastructure improvements in the past including power lines with utilities. The standard form license agreement does contain many protections in favour of AFNWA notwithstanding that it is drafted as a license agreement as opposed to a lease. Risk can be mitigated by negotiating provisions in the license agreement to obtain the right to put up fencing/barriers for safety reasons. Further, the likelihood of termination by the Government of Canada, which would then transfer liability, arguably, back to the federal government, would appear unlikely once the assets have been upgraded, segregated and transferred to AFNWA.</li> </ul>

## Appendix 11 – Consultant Reports

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In addition to key AFNWA engagements (Appendix 2), and developments identified in Appendix 3, various consultant reports have contributed to the development of understanding the AFNWA opportunity. Key consultant reports include but are not limited to the following:

- Preliminary Five-Year Business Plan, Halifax Water and Accelerator Inc. April 6, 2018
- Corporate Structuring for Atlantic First Nations Water Authority, Halifax Water and Accelerator Inc. August 8, 2017
- Ulnooweg Community Financial Analysis – Final Interim Report, Ulnooweg Development Group Inc., March 31, 2018
- APC – First Nation Asset Condition Assessments Final Report, CBCL Limited, April 2018
- AFNWA Business Case Reconciliation, AFNWA Gap Analysis - Rev 1. CBCL Limited. March 5, 2021.

## Appendix 12 – Letters of Support

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The following letters have been collected to demonstrate the strong contingent of support for the concept of a First Nations owned and operated water utility. Their support is grounded in the belief that First Nations should exercise their right to self-govern, especially in sector as fundamental as the delivery of safe water. These letters recognize the AFNWA will bring improved public health and safety, support long term cultural growth, and provide positive economic and environmental outcomes. Attached you will find letters submitted on behalf of:

- Premier, Nova Scotia
- Atlantic Mayors Congress
- Dalhousie University

Along with the letters of support, public opinion data from 2017 & 2018 has been attached. It was found that when Atlantic Canadians are informed of the research supporting the creation of an independent water authority to deliver water service to First Nations communities, a large majority of residents support the proposal. It was also found that:

- Support for the proposal is high across regions and demographic subgroups of Atlantic Canada.
- The primary reasons that Atlantic Canadians support an independently owned and operated First Nations water authority include that it is their right, that the communities should be responsible for their own water, and the need for safe water.
- The majority of Atlantic Canadians agree that an independent First Nations water authority can be done safely with appropriate regulations, is an important part of reconciliation, and can be operated as cost-efficiently as other municipal water authorities.



THE PREMIER  
HALIFAX, NOVA SCOTIA  
B3J 2T3

July 10, 2019

The Honourable Seamus O'Regan  
Minister of Indigenous Services Canada  
10 Wellington Street  
Gatineau QC K1A 0H4

Dear Minister O'Regan:

I am writing to you to express support for the establishment of the Atlantic First Nations Water Authority (AFNWA).

As Premier I have been aware of this project for several years. Our support is grounded in the belief that First Nations should be supported in assuming responsibility for their own community infrastructure. One of the most fundamental aspects of this is the ability to have clean, safe drinking water and effective waste disposal in every community. A dedicated regional water authority will improve public health and safety while also ensuring positive economic and environmental outcomes. I believe that the creation of the AFNWA is fundamental to the long-term cultural and economic growth of Mi'kmaq communities in Nova Scotia as well as the other First Nations communities in Atlantic Canada.

I have been very impressed by the approach taken by First Nations as they laid out their plans to create a regional water and waste water utility; the innovative structure is based on best practices in utility water and wastewater service delivery, financial modelling, and corporate governance. Just as important, the foundation of this initiative is based on extensive, in-depth input from First Nations communities in Nova Scotia, New Brunswick, and Prince Edward Island.

I urge you to support this important and innovative project. If you have any questions, I would be pleased to discuss them with you.

Sincerely,

Honourable Stephen McNeil, M.L.A.  
Premier of Nova Scotia



Minister of Indigenous Services  
The Honourable Seamus O'Regan  
10 Wellington St.  
Gatineau, QC  
K1A 0H4

April 27, 2019

Dear Minister O'Regan,

We are writing to you to express support for the establishment of the Atlantic First Nations Water Authority (AFNWA).

The Atlantic Mayors Congress has been watching the development of this project with interest and has received an update on its progress by Halifax Water General Manager Carl Yates at our meeting April 26, 2019. The Atlantic Mayors Congress fully supports clean safe drinking water and effective wastewater treatment for all Indigenous communities in our region. Our support is grounded in the belief that First Nations should be able to assume responsibility for their own communities. A dedicated regional water authority will improve public health and safety while also ensuring positive economic and environmental outcomes. We believe that the creation of the AFNWA is fundamental to the long-term cultural and economic growth of First Nations communities in Atlantic Canada.

Atlantic Mayors have been very impressed by the approach taken by First Nations as they laid out their plans to create a regional water and wastewater utility; the innovative structure is based on best practices in utility service delivery, financial modelling and corporate governance. Just as important, the foundation of this initiative is based on extensive, in-depth input from First Nations communities in Nova Scotia, New Brunswick and Prince Edward Island. We believe this initiative should be inclusive of all Indigenous communities in the Atlantic Region.

We urge you to support this important project. If you have any questions, we would be pleased to discuss them with you.

Yours Sincerely,

Mike Savage  
Mayor of Halifax,  
Chair, Atlantic Mayors Congress

July 5, 2019

The Honourable Seamus O'Regan  
Minister of Indigenous Services  
10 Wellington Street  
Gatineau QC K1A 0H4

Dear Minister O'Regan:

On behalf of Dalhousie University, I am writing to advocate and express support for the establishment of the Atlantic First Nations Water Authority (AFNWA).

For nearly a decade, Dalhousie has actively supported the Atlantic Policy Congress for First Nation Chiefs in the development of this project; it achieves critical societal goals of First Nation communities in the Atlantic region and plays a critical role in the sustained health, cultural, and spiritual strength of these communities. Conversations with Dr. Graham Gagnon, Dalhousie's Associate Vice-President Research and Director of the Centre for Water Resource Studies, have confirmed that progress in AFNWA development has been robust and the project's potential for significant impact is clear. Dalhousie's research pillars are informed by the United Nations Sustainable Development Goals and the AFNWA has the opportunity to address many of the goals directly - Good Health and Well-Being (SDG 3); Clean Water and Sanitation (SDG 6) and Reduced Inequalities (SDG 10) to name a few.

We anticipate that a dedicated, Indigenous-led, regional water authority will improve public health, while also providing a platform for positive economic, educational and environmental outcomes. The AFNWA demonstrates a career pathway for STEM-based learning and scholarship opportunities for Indigenous youth that could significantly impact First Nation communities for generations. With this in mind, Dalhousie will be pleased to work in partnership with the AFNWA to support its ambitions and research and training needs in a manner that meets the technical needs of the water community while being respectful of First Nation culture and values. Dalhousie is committed to Truth and Reconciliation Calls to Action and will work with the AFNWA in supporting academic programming that advances these goals.

Minister O'Regan, I strongly recommend that you support this important, innovative project. If you have any questions, I would be pleased to discuss them with you.

Sincerely,



Teri Balsler  
Interim President and Vice-Chancellor



Colliers  
Project Leaders

[colliersprojectleaders.com](http://colliersprojectleaders.com)



ITEM # 6  
AFNWA Board  
31 March 2021

**TO:** Chair Wilbert Marshall, and Members of the AFNWA Board

**SUBMITTED BY:** original signed by  
Adam Gould, BA, BPR, MAIC,  
Manager of Communications and Outreach

**APPROVED:** original signed by  
Carl Yates, M.A. Sc, P.Eng., interim Chief Executive Officer

**DATE:** March 24, 2021

**SUBJECT:** **AFNWA Communications and Outreach Strategy**

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### Regular Item

#### ORIGIN

Approval of the Transition Implementation Plan (TIP) at the Board meeting of June 24, 2020.

#### RECOMMENDATION

It is recommended that the AFNWA Board of Directors approve the *Communications and Outreach Strategy* as presented.

#### BACKGROUND

In recognition of the importance of communications and outreach to the success of AFNWA, the TIP contemplated the development of a strategy to frame our approach.

For optimal, shared success, a PR strategy is necessary with long-term planning executed by best practice tactics, which are detailed in the attachment. Members of the Senior Management Team and National PR provided ideas and recommendations which have been incorporated for the Board's consideration.

### **DISCUSSION**

The strategy outlines communications channels (verbal, written, social media, etc.) to be used when providing information and updates to key stakeholders. Strategies will provide key audiences and stakeholders updates through tactics by AFNWA Senior Management. The upcoming website launch will provide a permanent digital home and info source for community members and Operators, including background about our work, how to join AFNWA and documents that guide our actions and milestones. Social media presence will be continued on many platforms including mobile apps as they are proven communications tools for updating First Nations and other key audiences.

### **ALTERNATIVES**

None.

### **BUDGET and FINANCIAL IMPLICATIONS**

Funds for the implementation of the Communications and Outreach Strategy are contained in the 2021/22 Operations Budget.

### **ATTACHMENT**

- AFNWA Communications and Outreach Strategy document (PDF)

Report Prepared by original signed by

Adam Gould, BA, BPR, MAIC

Manager of Communications and Outreach

Financial Reviewed by original signed by

Carl Yates, Interim Chief Executive Officer, (902)-435-8021

## COMMUNICATIONS STRATEGY

### Overview

The Atlantic First Nations Water Authority (AFNWA) is the reality of a long process of engagement and necessity, incorporated by the *Canada Not-For-Profit Act* on July 18, 2018. Since then, consistent efforts have seen agreements signed with federal departments, Board members selected with appointment of a Chair and Vice Chair, and the CEO and COO hired. Most recently, we have completed the recruitment of the Senior Management Team. Our goal is to be fully operational by spring 2022, consistent with the Board-approved *Transition Implementation Plan* (TIP) dated June 24, 2020.

A question AFNWA had already received is, “will signing-on with AFNWA cause us to lose any sovereignty as a band as we are working towards self-determination.” The answer is a strong “no.” AFNWA will also address this publicly via its website. One section under COMMUNITIES will feature a section for interested communities on AFNWA’s ‘benefits’ and ‘reasons to join’ in our “call to action.” It will also have a FAQ / Q&A section.

Community visits, in person or virtual, are an option moving forward to answer questions at the community member level. Also, the communications department is ‘always on duty’ as PR is a constant cycle for shared successes.

A fledgling utility in its infancy has many challenges ahead and communications is key to keep stakeholders engaged and address any concerns that arise. We are fortunate that a long-standing funding issue has been addressed with the Government of Canada pledge to provide clean water to Indigenous communities (December 2, 2020, Minister’s announcement), with 100% of the funding for operations and maintenance.

AFNWA is currently building capacity as, beginning in 2022, it will be responsible for delivering water and wastewater services to over 4,500 households and businesses representing over 60% of First Nations communities in Atlantic Canada. As the owner/operator of community water and wastewater systems, AFNWA will assume the responsibility and liability for operations, maintenance, and capital upgrades for water and wastewater infrastructure.

Four working groups are currently meeting to ensure a smooth transition of responsibilities and liabilities from Indigenous Services Canada to AFNWA. These working groups encompass asset management, regulatory framework, lands, and transfer agreement drafting. The collaborative work being done with government and corporate partners will facilitate the full transfer of assets while reporting up to a main negotiation table.

This future transfer of responsibility for water and wastewater services has signaled an important step towards reconciliation and respect for First Nations culture and processes within traditional territory. First Nations communities are growing in Atlantic

Canada, and in addition to fostering greater self-determination, the AFNWA represents an opportunity to create jobs and support the economic potential and growth of these communities.

As AFNWA is still very young, strategies and tactics may change over the course of five-to-ten years; they may evolve, be eliminated, or innovated to improve and streamline specific medium and message. Messaging must also be clear, concise, and presented in 'plain language' without industry-based terminology that could confuse audience(s).

When Covid-19 restrictions end, AFNWA plans to be actively visible in communities, primarily through the work of Operators, but through outreach events and participating in community initiatives. When the pow wow trail reopens, expect to find us on it with information booths and promo items. AFNWA has already sponsored events in its short time, and will build on this by supporting conferences, symposiums, water-related gatherings, and sports and recreational events. Roll-out for AFNWA's first scholarships will begin this spring.

Residents of member bands, and non-member communities, will have questions and concerns, which can be addressed by their respective leaderships, but AFNWA will be open and transparent to provide not only answers but solutions. In that regard, some quick wins at the beginning will go a long way in gaining trust and confidence from the member communities we serve. Some questions can be answered from the FAQ/Q&A section of the AFNWA website, others will be facilitated by the Manager of Communications & Outreach.

With a strong online presence, open two-way communications channels, and a dedicated department lead by senior manager, all communications issues shall be addressed with timeliness, accuracy, and professionalism.

## **Audiences**

### General public

A broad audience(s) to target but should be treated as one. A public, incorporated utility owned by First Nations may be subject to stereotypes and it happens; our non-profit status and fiduciary responsibility are central to transparency. Documents including annual reports, newsletters, and service info will be accessible through the upcoming website. While social media will be monitored by internal staff, anyone will be able to join follow our pages.

### Chiefs and Councils, Members / Owners

Regardless of membership status, Chiefs and Councils are a primary audience. While the AFNWA board is comprised of Chiefs from member communities; leadership is influential in relaying information to their respective communities. Chiefs and Councils are the elected officials of their bands and make all important decisions for community.

### Non-member communities

AFNWA's membership is always open, and it could increase from 15 to all 33. Previous contact was made with several bands, with some joining. A small number have not joined but have shown some interest or none at all; we opt to make contact with updates via newsletter to share progress. The website will feature a section on benefits of joining AFNWA and FAQs.

### Elders

The Elders Advisory Committee (EAC) will be an asset in guiding AFNWA progress, and we should be proactive in communicating with them. EAC will appoint a lead to participate in BOD meetings and report back to the EAC. Communications projects will introduce the Elders Advisory Committee and have a home on the website. Elders enjoy promotional merchandise and AFNWA will note this when purchasing. Small items can be packaged and sent; larger items used at in-person gatherings. Social media campaigns that offer prizes is also optional.

Some communities have seniors' groups (i.e., Membertou has its 55+ Club with a full-time staff person). AFNWA will build a list of related groups and send quarterly updates by brief, newsletter, etc. Tactics for consideration are readability (text size, fonts), use visuals (photos, graphics), adding social media links, and PowerPoints (or slideshows); detailed, printed materials. Once Covid-19 restrictions ease, community visits can begin which may be the best practice.

### Operators

Open two-way communications with operators are key to mutual success. They will have access to our website (portal) and be communicated to directly by the CEO and senior manager(s). AFNWA management is 'always on duty' and can address Operator concerns at any time. Regular workshops to update Operators on progress and get direct feedback on projects will continue.

### Media

Consider the media to be our partners in a canoe; they steer, we do all the paddling. Newscasters and journalists are resourceful in communicating messages to a 'general public' audience through broadcast, news releases, articles, etc. A healthy relationship with local media (print, digital, broadcast) and journalists equates to reliable reporting. Our messages must be concise, clear, and easily understood. Requests for information will be responded to in a timely fashion by the appropriate contact.

### Government(s)

A key set of audiences is government, mainly at the federal level as funders and supporters. AFNWA works directly with Indigenous Services Canada in focus group collaboration. Provincial issues also need to be taken into account as some of AFNWA's work will need to consider educational programs, training, regulations, codes, etc., requiring adherence and adoption of procedures.

## **Specific Challenges**

Every newborn must crawl before it walks, a water utility is not exempt from having to 'start somewhere.' The first year of any organization is its most challenging. Progress and milestones have already occurred with the recruitment of the senior management team, completion of the Business Case after a peer review from the Ontario Clean Water Agency (OCWA), and the signing of a lease for a facility in the Millbrook Power Centre. The utility is well positioned to ramp up activities in 2021/22 consistent with the

### Business Plans

With AFNWA's development of a 10-year Business Plan in 2021, it requires a specific program to engage Chiefs and Councils and community staff as efficiently as possible. A direct contact system is the best practice here, but AFNWA must also consider all opportunities for effective communications. With asset management transferring to AFNWA from individual bands, our message(s) is simple: AFNWA assumes all liability and responsibility from this agreement, funding and service levels will improve, and communities and the environment will be looked after. Owners and communities will be notified clearly and timely of the upcoming plan implementation with key stakeholders receiving direct updates. Details can also be published on the website.

### *Transfer Agreement*

The AFNWA will be negotiating a transfer agreement for water and wastewater service delivery from the Government of Canada. As such, there are issues regarding lands, infrastructure, funding, and regulations that must be contemplated, negotiated, and agreed upon. It is vitally important that our member Chiefs and their Councils are up to date on these activities and have opportunity to provide feedback. Regular updates in the form of briefing notes will be provided to our member Chiefs. Additionally, the AFNWA will hold zoom and in person meetings with all its member Chiefs, inclusive of an AGM in September, to provide updates and hear feedback.

### Government Change(s)

#### *Band level*

A newly elected Chief and Council may decide to discontinue being AFNWA members. It is possible that a succession plan was not part of the leadership transfer and a new Chief and Council may not have "even heard of AFNWA." Interest may decline with a current leader. Bands have elections every two or four years; leadership and influence could often shift.

#### *Federal government*

As part of its 2015 campaign promises, the Liberal Party (now government) pledged to end all water problems in Indigenous communities by March 2021. Canada's Liberals are now a minority government and over 100 boil advisories have ended, but communities remain underfunded and without adequate services. In December 2020, the GOC confirmed that 100% of funding is now provided for operations and

maintenance, formerly an 80/20 split. The concern here is 'regime change;' a new government (i.e., a majority opposition) could pose a risk to AFNWA existence by renegeing and slashing funds.

### Band(s) Withdrawal

Once a band formally joins AFNWA and transfers its assets, it cannot technically 'just leave' on its own but if a majority want to leave, the organization could be dissolved. Focus must remain on the committed work of AFNWA and our service quality. If problems arise, we fix them; as stated by Chiefs in the initial engagements to form the AFNWA, politics should not play a role in decisions that affect every community member.

### Misinformation and Misinterpretation

A PR issue all practitioners face; misinformation is rampant on social media and 'bad news' or misinformation will travel faster than facts. It is unavoidable as misinterpreted information can be shared by users and then 'snowball.' AFNWA will address such issues through page posts and messages. Our messages must be very clear, short sentences for clarity (i.e., avoid redundant and 'jargon,' and run-on syntax). A dedicated Admin can facilitate social media pages with managerial guidance. Useful ways to accommodate this are messages that ensure AFNWA transparency and enforce a message that communities can 'always come to us.'

### Community resources

A reliance on digital communications poses a risk if communities are not technologically equipped. Not every community has strong Internet services or could not have public access available to offline residents. Internet quality is important to consider; dial-up is still used in rural areas due to lack of availability by Internet service providers (ISPs). We cannot assume that everyone is 'connected' to strong Internet, nor that residents have a smartphone, computer, tablet; pay-as-you-go is a popular option.

### 'Geography' to cover

AFNWA currently has 15 members and will accept new members as it grows. Nova Scotia has 13 communities; New Brunswick, 15; PEI, 2; Newfoundland and Labrador, 4. It is a lot of territory to cover 33 (34 with Qalipu) unique communities. Messages must be the same for all, easily understood; a misinterpretation in one community has potential to spread over a large area and quickly.

### Language(s)

Atlantic Canada is home to three distinct Indigenous groups, the Mi'kmaq and Wolastoqiyik (Maliseet) Nations, and the Inuit and Innu (Newfoundland and Labrador). Mi'kmaq and Maliseet languages, though similar in some ways, are very distinct from one another. The Inuit, speaking Inuktitut, is from a separate language family. Not everyone may have English comprehension and require translation(s) in either traditional language.

## Resources

AFNWA's strategies will include external and internal methods and practices, with open two-way channels to send and receive messages. Maintaining open communication lines give organizations their legitimacy and accountability; a customer/client-based service or product needs to be open and receptive to feedback of all types. We are committed to strong service delivery and social-corporate responsibilities.

In addition to AFNWA's online presence, where audiences can access information at any time, we will communicate directly to community members on-reserve (and off-reserve). AFNWA will be a proactive program in our member communities, not only through the work of Operators, but through open invitation information sessions where residents can receive direct information. Promotional items, newsletters, FAQs are communications tools of consideration. Such events will be advertised through our social media platforms, website, and community notices.

### Leadership

AFNWA's 15-member board of directors (*Board*) includes three technical experts (one-fifth) and 12 Indigenous representatives with membership determined by the owners (or members). Communities do look to its elected leadership and administration for information. We should be able to rely on our Chiefs / Board as ambassadors for the utility. If the Chief/Director cannot address an issue, they should refer the community query to AFNWA directly for follow up (phone call, site visit, workshop, info session, as required). The Board should avoid involvement in daily operations as that is staff responsibility. **Simply, 'send them our way.'**

### News media

AFNWA is fortunate to have Aboriginal Peoples' Television Network (APTN), a national level news station, have a Halifax sub-office with journalists. APTN covers Indigenous-related stories with objective reporting. The Communications and Operations Manager has a 'professional friendship' with local APTN journalists, AFNWA will build on this relationship while looking into other news networks such as Kukuwes, Saltwire, and Transcontinental. Many news media are centralized; one story can be published through several more channels and picked-up by others. AFNWA was featured in a series by APTN, Global News, and Concordia University and will continue generating milestones and news stories.

### Staff

#### *Internal*

Like leadership, well-trained staff of any organization will always be the goodwill ambassadors of their organizations! AFNWA is building a team that includes some of the best talents in their respective disciplines on its Senior Management Team. With First Nations staff, residents see that Indigenous people in Senior Management, and will

see community-based Operators working daily. AFNWA strategy could include a campaign where Managers, Supervisors and Operators are introduced to all communities (*Ask AFNWA, Our Community-Based Operators*, etc.). Again, send them to us! AFNWA staff are always the 'first line' of information and communications, but project(s) may call for external talents.

#### *External (Band staff; communications departments/ reps)*

Let us put networking to use and connect with individual communications departments to share our messages through their channels. Operational costs do not exist for this service, it is what communications departments do!

#### Corporate services and network

National PR has assisted the Communications and Outreach department to date and will continue to provide project support when needed. National is Canada's largest communications firm and produce quality results using best practices. AFNWA has learned much from NPR, and continued networking will add to the department's capacity, as well as provide that "second set of eyes and ears."

### **Communication Channels**

#### Direct contact

Our stakeholders will be notified personally from the Senior Management Team - CEO, COO, and Managers of Engineering, Communications and Outreach, Corporate Services (CFO), and Operations. We will contact government partners, Board, members directly, from person-to-person, with messages sent from the CEO and/or COO through usual methods: email, phone, meeting via virtual or in-person.

The Board currently meets bi-monthly and may request meetings at any time per the Governance Manual. AFNWA will also continue to host workshops, training, and educational support with invitations (directly or openly) to attend or participate. The Elders Advisory Committee will appoint a member to participate in Board meetings, receiving the same information.

Presentations allow for interaction, and make proper use of visuals (photos, charts, videos, graphs, etc.). Audio could be optional through digital report recordings, audio briefings, videos, etc. Written documents and briefs can also be prepared. AFNWA is a utility and staff are 'always on duty.'

#### Community outreach

AFNWA plans to sign its office lease on April 1, 2021 and move-in promptly and establishing its presence. Upon opening, AFNWA has a place to call its home. Community members, stakeholders and partners will have opportunity to walk into the headquarters and see who is working for the communities.

AFNWA will also establish an office presence for the Operations Supervisor in each hub community within a specific service region; there are currently 5 regions that will adopt the hub and spoke approach to Operations.

Residents will be invited to join AFNWA in their own communities through information sessions and gatherings; virtual meet-and-greets can be done through recorded videos and live streams.

Media events and facility tours are also very effective ways to create support. This will be particularly important when AFNWA reaches critical milestones and makes investments in infrastructure for the betterment of the communities we serve. An initiative may be Operators' profiles, visuals of work being done, and virtual tours recorded for later viewing.

With a goal of helping to aid studies and careers, AFNWA sponsors two scholarships through NSCC (*Nujo'tmuk Samuqwan Award*) and NBCC (*Danny Lanteigne Memorial Award*). First Nations students in water and wastewater services-related courses are eligible.

#### Digital apps

Covid-19 changed the ways we meet and work, with digital apps such as Zoom, MS Teams, and RingCentral becoming a communications norm. These platforms can be also used for training and teaching, virtual info sessions with Q&A forums and presentations, and project management. These tools are ideal to use individually or in groups and will complement AFNWA's plans for website and social media use. We are only a phone call or email away to set-up virtual meetings and presentations. Operator workshops have already been done via Zoom.

#### Logo and visual identity

Brand power is a legitimate communications tool, and ours is easily identifiable. Our logo needs to be on all internal and external communications including PR literature, email signatures (not replying), etc. Our logo is an identity; it symbolizes AFNWA's commitment and strong service delivery. It will be easily identifiable and recognized in communities. Requests to use AFNWA logo will require approval from the Manager of Communications and Outreach.

Placement is also important to consider; our own headquarters is a good example. The building's location and shape make it a unique challenge to incorporate the brand, but also unique opportunities to place signage that clearly identifies AFNWA; commuters and local community can experience our presence and visit any time.

#### **Website and Social Media**

A public utility will rely on using different mediums for its messaging. Online communications is the standard during our era, and AFNWA will make strong use of Internet-based practices and tools including its upcoming website, social media.

Websites are overlooked in a society littered with thousands of messages, yet their efficiency and practicality remain a communications standard. They produce accurate information where visitors can 'get facts from the source.' National PR and eOpen are partners with AFNWA's website, assisting with content and construction. We expect to launch the website in spring 2021, be mobile friendly, and easy to use and understand.

Fundamentally, a website should be the main source of information and news for any entity, especially not-for-profits and utilities. The content, look, and maintenance of a well-designed website is a best practice and resource allowing visitors to access information at whim. AFNWA communications intends for our site to be easily navigable for all. We want site visitors to gain an accurate understanding of AFNWA, our services, and team.

AFNWA plans to hire a Website Tech and Administrative Assistant as members of its Communications and Outreach Team. With a full-time staff member(s) dedicated to maintenance, updates and news can be published as information is received internally (i.e., a waterline breaks in community), or via public event (i.e., a Minister's announcement). The tech will also develop a strong working relationship with eOpen, our service provider, while ensuring our webpage is current and easy-to-use.

On [www.afwna.ca](http://www.afwna.ca) visitors will find a library of public AFNWA documents and our financial statements. Sharing public milestones and expenditures builds and strengthens accountability and can make communities feel inclusive. Important details to note are the biography pages for Senior Management and staff, the Board, and Elders Advisory Council, allowing audiences the 'visual connection' to us; the 'faces to names' and 'seeing other community member(s)' concepts all work as part of this strategy. Maps, developed by the Engineering Department, will introduce our members and owners to site visitors, who can take a virtual tour of communities via links that will take you to their respective homepages.

Social media is enormously popular and efficient when used properly with its extensive platforms reach millions. At AFNWA, we won't be communicating to collective audiences on that scale, but social media allows external messages feedback to exchange between audience and organization. It also allows sharing on other platforms simultaneously, monitoring by hosts, and is shown to be useful in communicating with community members. For Indigenous communities, social media is effectively used by community-based non-profits and NGOs.

AFNWA continues building its LinkedIn page support with industry professionals, and internal staff sharing posts on individual profiles. We will build a Facebook and Instagram profiles, and also Twitter for quick updates and tactical messages. Social

media allows for organizations to receive feedback directly and indirectly from page followers.

Hashtags will be added to external communications, social media posts, PR literature, and email signatures (if necessary), allowing **#AFNWA** posts to trend together.

AFNWA will host pages on other social media, further developing an online presence. Below is a list of intended social media with descriptions:

- LinkedIn: currently active with over 100 members; audience includes professionals, recruiters, service partners, journalists, government (bureaucrat) and corporate partners; less 'flack' compared to other social media apps.
- Facebook and Instagram: cousin companies; visuals, short messages, allows resharing and trending; community reach, effective with communities and younger generations.
- Twitter: audience includes news media and government (MPs and Ministers); able to produce quick news and messages (i.e., water break, boil order); allows resharing and trending (i.e., #AFNWA, all related topics are found together under hashtag).