

TOWN COUNCIL AGENDA February 7, 2023

7:00 p.m. YouTube Live

Let us begin by acknowledging that we are gathered today in Mi'kma'ki. The ancestral, present and future territory of the Mi'kmaw people. Today, we gather with the intent followed by the living Peace and Friendship Treaties - with respect, cooperation and coexistence.

Call to Order

1 Approval of Agenda

2 Minutes

2.1 Regular Meeting – January 26, 2023

3 Presentations

4 Correspondence - Action Items

- 4.1 Doris Cook Request for Reimbursement (Deferred from January 26, 2023)
 - a. Staff memo
- 4.2 Tony Sampson Solar Garden site runoff.
- 4.3 Peter Hackett, Department of Public Works Ferry service Main to Yarmouth

5 Correspondence - Information Items

6 Staff Reports

- 6.1 Staff Report to Council February 7, 2023
- 6.2 Staff Report Marina Wharf (Deferred from January 26, 2023)
- 6.3 Staff Report to Council MBDFD Purchases
- 6.4 Draft Public Engagement Plan Strategic Plan Review
- 6.5 Community Solar Garden Monthly Update December 2022
- 6.6 Staff Report Solar Garden Stormwater Update
- 6.7 Staff Report Winter 2023 Transportation Update
- 6.8 Staff Report Accessibility Audits

7 Council Items

- 7.1 Mayor DeVenne Committee Appointments
- 7.2 Mayor DeVenne Lunenburg County Accessibility Advisory Committee Appointment
- 7.3 Councillor Feeney Kenyan Flag

8 Committee Reports

8.1 Policy and Strategy Committee – January 30, 2023 – Draft Minutes

9 New Business

10 Closed Session

10.1 MGA 22(2)(g) - Legal advice eligible for solicitor-client privilege

The Regular Meeting of Town Council for the Town of Mahone Bay was held on Thursday, January 26, 2023 at 7:00 p.m. in Council Chambers and broadcast via YouTube live.

Present:

Mayor D. DeVenne

Councillor P. Carver

Councillor J. Feeney

Councillor R. Nowe

Councillor K. Wilson

Councillor S. Lohnes-Croft

CAO, D. Heide

Town Clerk & Deputy CAO, M. Hughes

Absent: Deputy Mayor F. Kangata (regrets)

Gallery: Online & 0 in-person gallery

Public Input Session

Council received comments from Karl Nauss and John Bain, both of Mahone Bay, expressing concerns about the fact that the old firehall is not being used for Public Works operations, the recent installation of speed humps on Pleasant Street and Fauxburg Road, and cost overruns on past Town projects.

Land Acknowledgement

Let us begin by acknowledging that we are gathered today in Mi'kma'ki. The ancestral, present and future territory of the Mi'kmaw people. Today, we gather with the intent followed by the living Peace and Friendship Treaties - with respect, cooperation and coexistence.

1. Agenda

A motion by Councillor Carver, seconded by Councillor Feeney, "THAT the agenda be approved as amended to add an additional closed session item, 10.3 Personnel Matters which is permitted under MGA 22(2)(c)."

Motion carried.

2. Minutes

A motion by Councillor Wilson, seconded by Councillor Nowe, "THAT the minutes of the January 10, 2023 regular meeting of Council be approved as presented."

Motion carried.

A motion by Councillor Wilson, seconded by Councillor Carver, "THAT the minutes of the January 18, 2023 special meeting of Council be approved as presented."

Motion carried.

A motion by Councillor Feeney, seconded by Councillor Wilson, "THAT the minutes of the January 20, 2023 special meeting of Council be approved as presented."

Motion carried.

3. Presentations

3.1 Mahone Bay and District Fire Department – Quarterly Report

Chief Adam Ekins presented Council with the Mahone Bay and District Fire Department Quarterly Report for September – December 2022.

A motion by Councillor Wilson, seconded by Councillor Nowe, "THAT Council receive and file the Mahone Bay and District Fire Department Quarterly Report." Motion carried.

3.2 Ramsay Duff and Tina Hennigar - MacLeod Group Health Services

Ramsay Duff, CEO, and Tina Hennigar, Settlement Coordinator, of MacLeod Group Health Services presented to Council with an update on the nursing home build project and the settlement of the international health care workers who will be joining the staff at the new nursing home.

<u>4. Correspondence – Action</u>

4.1 Doris Cook - Request for reimbursement.

A motion by Councillor Feeney, seconded by Councillor Lohnes-Croft, "THAT Council defer item 4.1 until the February 7, 2022 regular Council meeting." Motion carried.

5. Correspondence – Information Items

5.1 1792 Project Team Members – 15 Ships to Sierra Leone Update.

A motion by Councillor Feeney, seconded by Councillor Nowe, "THAT Council receive and file item #5.1."

Motion carried.

6. Staff Reports

6.1 Council Report

Council received the January 26, 2023 Staff Report to Council.

A motion by Councillor Carver, seconded by Councillor Lohnes-Croft, "THAT Council schedule a discussion of the RCMP service that the Town contracts through the provincial government for a special council meeting to be held on March 24, 2023."

Motion carried.

A motion by Councilor Wilson, seconded by Councillor Carver, "THAT Council direct staff to prepare a report including a commercial real estate valuation of the property for sale, the results of a public expression of interest for the old firehall, and a proposal from staff including costs to renovate the old fire hall into a long-term public works facility for the April 11, 2023 Council meeting."

A motion by Councillor Lohnes-Croft, seconded by Councillor Wilson, "THAT Council agrees that there is sufficient new information to warrant reconsideration of discussion about the use of the old firehall as a temporary public works building." Motion carried.

A motion by Councillor Lohnes-Croft, seconded by Councillor Nowe, "THAT the Public Works Department be permitted to store vehicles in the old firehall and use it for purposes necessary for maintenance and operations of the Town."

Motion carried.

A motion by Councillor Feeney, seconded by Councillor Carver, "THAT Council accept the Staff Report to Council for information."

Motion carried.

6.2 Staff Report – Marina Wharf

Council received a final staff report with an update concerning the Town-owned wharf at the Mahone Bay Civic Marina.

A motion by Councillor Feeney, seconded by Councillor Nowe, "THAT Council defer agenda item 6.2 Staff Report regarding the Marina Wharf to the February 7, 2023 agenda."

Motion carried.

6.3 Staff Report - Assistance with Heating Costs

Council received a staff report with an analysis of options to assist residents who are experiencing increased home heating costs this winter.

A motion by Councillor Wilson, seconded by Councillor Carver, "THAT Council direct staff to obtain legal confirmation on the ability of the Town to provide direct assistance to residents in the form of rebates to HOME Program participants and tax relief for Electrical Utility Bill Payment Program participants."

Motion carried.

Council took a break at 9:02pm and returned to regular session at 9:10pm.

7. Council Items

7.1 Mayor DeVenne – Committee Appointments

A motion by Councillor Feeney, seconded by Councillor Nowe, "THAT Council appoint Councillor Lohnes-Croft as the Town's liaison to the Mahone Bay Tourism and Chamber of Commerce."

Motion carried.

A motion by Councillor Nowe, seconded by Councillor Lohnes-Croft, "THAT Council appoint Councillor Carver and Councillor Wilson to the Nominating Committee."

Motion carried.

7.2 Mayor DeVenne – Regional Marketing Levy

A motion by Councillor Carver, seconded by Suzanne Lohnes-Croft, "THAT Council direct staff to provide Council with a report regarding the potential implementation of a marketing levy and interaction with the Provincial Short-Term Accommodation legislation."

7.3 Councillor Lohnes-Croft – Art Exhibit

A motion by Councillor Lohnes-Croft, seconded by Councillor Feeney, "THAT Council direct staff to prepare a report with information for Council on the costs and potential funding opportunities to cover logistics such as the rental fees, opening reception, and honoraria, for the Town to host an exhibit of *There is no one Story of Black Girlhood: A Series of Paintings by Rebecca Fisk.*"

Motion carried.

8. Committee Reports

<u>8.1 Asset Management Committee – November 17, 2022 – Draft Minutes</u>
Council received the November 17, 2022 draft minutes of the Asset Management Committee.

<u>8.2 Asset Management Committee – December 15, 2022 – Draft Minutes</u>
Council received the December 15, 2022 draft minutes of the Asset Management Committee.

<u>8.3 Lunenburg County Senior Safety Program</u>

Council received the December 2022 Monthly Report of the Lunenburg County Senior Safety Program.

A motion by Councillor Wilson, seconded by Councillor Feeney, "THAT Council receive the committee reports as submitted for information." Motion carried.

9. New Business

Councillor Feeney provided a notice of motion that at the next regular meeting of Council he will move or cause to be moved a motion directing staff to procure a Kenyan flag that could be used at future events for the incoming healthcare workers.

10. Closed Session

A motion by Councillor Feeney, at 9:40pm, seconded by Councillor Carver, to go into Closed Session to discuss legal advice eligible for solicitor client privilege and contract negotiations as permitted by the Municipal Government Act section 22(2), (g), (e), and (c) respectively.

Council returned to Open Session at 10:29 pm.

Council adjourned upon motion at 10:30 pm.

TOWN OF MAHONE BAY

TOWN OF MAHONE BAY

Mayor, David Devenne

Town Clerk, Maureen Hughes

Kelly Redden

From: Doris Cook <dorishowardcook@gmail.com>

Sent: Thursday, January 12, 2023 3:22 PM

To: Town of Mahone Bay Clerk

Subject: Request that this email be sent to all town councillors and placed on agenda

Follow Up Flag: Follow up Flag Status: Flagged

You don't often get email from dorishowardcook@gmail.com. Learn why this is important

CAUTION: This email originated from an external sender.

To whom it may concern:

I am requesting that the town of Mahone Bay reimburse me for my recent expense incurred due to the town shutting down my water during a water main break on Main Street, December 13, 2022. History:

—In June of 2021 there was a similar issue when the town was making major renovations to the ancient pipes and regarding the water for the new Nursing Home. I turned off my pump as always, when notified. The next morning my neighbours had water but I did not. A town worker, (Scot?) spent much of the day in and out of my house and yard, trying to address the problem. I finally had to call a plumber, Mason's, and my bill was \$481.28, for a new pump and labour.

—on December 13, 2022, late afternoon I saw the announcement of a water main break between 201 and 15 Main Street with no mention of Zwicker Lane. I checked my taps and clear water flowed as usual, including during the evening.

I was without water for more than 24 hours.

Therefore I am requesting reimbursement. I am available to discuss this in person or by telephone.

Doris Cook

32 Zwicker Lane

902-624-1230

Sent from my iPad

^{**} However, the next morning I had no water. I stopped a town truck and once again Scott? checked the leakage and facilities. I had to search for a plumber right to the last entry in the yellow pages. Wiles of Pleasantville were the only plumbers available. Their bill for replacement, labour, and travel is \$1777.90.

^{**}a Facebook post from the town at 7:34 advised that the water main had been repaired and what to expect.



MEMORANDUM

TO: Town Council

FROM: Maureen Hughes, Town Clerk & Deputy CAO

DATE: February 7, 2023

RE: Request for Reimbursement, 32 Zwicker Lane

On December 13, 2022, staff were notified that water was pooling in the vicinity of 181 Main Street. When staff responded to investigate they found that a water main had broken. Staff assessed the situation to plan how to address the water break and a notification of the water main break was shared on the Town's facebook page, website, and via the Town's mass notification system, CodeRED.

The message was as follows:

Water service will be interrupted between 201 Main Street and 15 Main Street today due to a water main break. Staff are on scene making repairs and hope to have water restored later this evening.

Please check the Town website for information on what to do after a water disruption. We apologize for the inconvenience and our team are making repairs are quickly as possible.

An update was sent out via the same channels at 7:34pm stating:

The repair to the watermain is now complete and water has been restored. If you lost water due to the watermain break, you can expect air in the line and discoloured water. Run a cold faucet until the water runs clear. If you still do not have water, please call our afterhours line at 902-543-3251.

On December 14, 2022 staff received a call from the owner of 32 Zwicker Lane advising that she was unable to contact a plumber and asked for help with her pump. Staff found that the pump was leaking water and did not deal with the pump as they knew that the pump was broken. The likely cause for the broken booster pump is that the pump continued to run with air in the lines which damaged the seals inside the pump.

The property in question is one of a few unique properties in town that require a booster pump because the water pressure is so low that it would be unusable without the additional assistance.

Town staff received requests from two properties on Zwicker Lane after the watermain break requesting the Town pay for damages; one for a water heater and the second being for the booster pump at 32 Zwicker Lane.

Town staff denied the request for payment of replacement parts as the Town has a long-standing procedure of being responsible for water service up to the curb-stop; once the water service is on private property it is the responsibility of the property owner for the functioning of their plumbing and equipment. Furthermore, this was an emergency water main break and there was no way that staff could have anticipated this issue.

The Town's procedure regarding responsibility up to the point where it becomes private property is followed for both the water and electric utility. It is the responsibility of the property owner to make provisions such as a fail-safe valve that can be attached to older pumps that do not have that as a standard component, or surge protectors for plugs for high-value equipment such as televisions, an item staff for which staff have requests to replace on occasion following power outages.

Town of Mahone Bay

Attn: CAO

CC: Town Council

CC: Lenta Wright (AREA)

Today is the 26th of January, exactly 1 year since the diggers rolled onto the property behind our house and started snapping the trees and deforesting the area to be the solar power plant. As I have mentioned before, not only were we not informed of this but zero thought was put into the obvious uncontrolled runoff this would cause.

We consulted with local engineers who came out and observed what was going on and warned us that the drainage being undertaken on the power plant property was not sufficient and also informed us of the potential damage that would occur to our property should the Town and AREA continue the way they were going.

My wife Heidi in consultation with other contractors suggested a plan where some of the panels could be moved back a very small distance on the power plant property and a drainage and terrace system could be achieved with drainage material and soil from the reshaping of the hill. We even suggested that this could occur on our land, what would have been a win for both parties. The Towns response to this was that we had a mistaken idea we had any power to negotiate.

Fast forward to today. We have now suffered a year of constant damage to our property every time it rains. I am in contact with AREA staff on a regular basis letting them know when there is a bigger problem than normal (our new normal that is , which is constant stripping of our land). The recent placement of hay bales and the minor reshaping of the hill behind the fence has made a small difference but has not fixed the fact that, as pointed out by the engineers we consulted with last year , the drainage undertaken for this project is completely insufficient and ineffectual.

I have videoed and photographed this project from day one documenting the mess that has now been created. I am now constantly hearing the words, "I am so sorry", "We are trying our best", "changes will be made", "staff are working on it" but that does not fix my property.

If we had been informed of this project, we would have sold our house and moved. We purchased this property 16 years ago as our retirement dream, and planned to build another residence on the rear of the property. My words to Heidi when we moved in were "take me out in a box". Now, even if we tried to sell, we cannot due to the fact we would have to disclose the continuing problem caused by the Town of Mahone Bay and AREA.

Our reality now is no matter what is done at this point we will suffer until the spring when , God willing, a permanent fix to the drainage issue created by this project can be implemented.

So far because of this project and not including the pain and suffering it has caused by the destruction of our retirement plans:

- We have lost tons of topsoil into Mahone Bay due to the uncontrolled runoff from the solar power plant across our property.
- Our once small garden stream is now 3 1/2 feet deep in places and is a raging torrent.
- The rocks lining the stream have collapsed in and the stream bed stripped away.
- Our cobbled path has had the bedding under the cobbles stripped away in places.
- Our beautiful 100yr old granite wall has had the right hand side leached out and is caving in.
- The floor of our garden shed and sauna has been destroyed and the foundations undermined and are vanishing every time it rains.
- Giant trees have had the soil stripped off their roots and are now exposed.
- Windows on the eastern side of the house now are not securing properly.

We have even had water intrusion into our basement which has always been dry. Although there is only small amount of water in our basement at this moment, this is only the beginning of winter. The ground is now saturated and as we all know will now freeze when the next cold spell hits. This will leave nowhere for the water and melting snow off the solar plant to go except through our property.

So far AREA in conjunction with the Town of Mahone Bay managed to repair some of the damage done to the area around our well but even that is being dug out again by the uncontrolled runoff.

My initial anger and disbelief that this project could go ahead with zero consultation has now turned to sorrow, sorrow for the damage done to the environment, sorrow for the damage done to our property and sorrow for the fact that we are now stuck here with this disaster.

What we now want to know after suffering this chaos for a year is what is the plan to fix this damage? Does the Town even have a plan to fix it? Who is our go to contact or contractor that is dealing with fixing it? I had to rent space to store my boat trailers last year due to the fact of the damage to our property and am guessing that will have to happen this year too. The amount of damage being done to our property directly caused by this power plant project is heart breaking and the costs are increasing daily.

As I mentioned before, I am in contact with Lenta to try and get through this winter as best as possibly but there needs to be some serious work done on both properties now to fix the damage done and ensure this does not happen again in the future. It is only time, money and a lot of big machinery, soil, drainage and planting can solve this now.

In my conversation with Lenta today I expressed concern over the 6 locations that breached the solar power plant fence line this morning during the rain causing mass stripping and a giant

mushroom cloud of silt entering Mahone Bay. There is no way of getting an excavator behind the fence at the present time without destroying the fence. I have offered Lenta the opportunity to take the entire corner off our property with their contractors in an effort to assist with this problem and save further damage to both the properties as a short term fix for the winter. There is a finite time window here before the freeze and the snows come, we have dogged a bullet so far. I need to know in writing who will be doing this and when will things start getting done to fix this. As mentioned in my letter dated 30th of August, we would rather deal with this with open dialogue, but if this cannot be achieved we will be left with no choice but to take The Town of Mahone Bay and AREA to court.

We have waited a year and are still waiting for our initial request for documents relating to this project, please do not put this off any further.

I am available to talk or meet anytime in the near future. I await your reply with interest,

Tony Sampson



JAN 2 3 2023

Dylan Heide, Chief Administrative Officer Town of Mahone Bay PO Box 530 Mahone Bay, NS B0J 2E0

Dear Dylan Heide:

As you are aware, the Province is in the process of undertaking a comprehensive socioeconomic study on the value and impacts of the investment in a ferry service from Maine to Nova Scotia.

The Province is committed to investing in economic development in every region, and supporting a thriving economy from coast to coast to coast, but this means understanding the return on taxpayer investment, making practical assessments of best investment opportunities and working closely with stakeholders.

In this case, that means having frank discussions about whether a ferry is the best investment or whether there are alternative investments that could generate more significant economic activity.

It is important that we identify any potential steps that can be taken to improve the economic impact on Nova Scotia, but this first means understanding the facts around the current impact of the service so that decisions about long-term economic development investment decisions can be made in a fair and open manner.

The history of the Yarmouth-Maine ferry connections is well known. Suffice it to say that between changing ports, losing time due to vessel issues, losing a season to renovations and losing entire seasons related to COVID-19 border measures, the last few years of this service have been difficult.

Much of the discussion around the impact, positive and negative accounts, have been anecdotal. It is important that the discussion moves to facts. This is the reason that the first formal economic impact analysis of the ferry service is necessary.

We are writing to seek your input on information you think would be beneficial to seek and include in this study. It will be undertaken by a highly qualified, experienced firm (identified through a competitive procurement process) but beyond that, our initial belief is that the study should include a review of:

All data sources including, but not limited to:

- Ferry ridership information, including source market;
- NS Visitor Exit Survey information;
- Direct/indirect economic impacts for employment, household income and GDP generated by those expenditures for the specific industry that received the expenditure from Department of Finance; and
- Estimated provincial tax revenues generated as a result of personal income taxes and sales taxes paid by workers from the Department of Finance.
- Targeted primary research including:
 - Consultation and interviews with individuals, small businesses and industry groups most impacted and affected; and
 - An analysis of the true impacts to the Southwestern region and the province. It will help to quantify impacts such as changes in income, employment, value-added by local and regional suppliers, government revenues, workforce planning and the travel trade industry.

The Province intends to use the study to bring needed clarity to Nova Scotians pertaining to the overall economic benefits and costs of this ferry. It will assist in answering questions such as:

- Is the Maine-NS ferry service, as currently constituted, a viable operation and worthy of continued tax-payer investment?
- Are there alternatives or complements to achieve or deepen the economic impact that government could consider?
- Can we establish a baseline for visitors taking the ferry to Nova Scotia that equates to an economic benefit and quantify that benefit?
- Are there other tangible societal and community benefits derived from the ferry service that have economic value?
- Are there other, more impactful ways of using public dollars that would achieve an increase in tourism to Southwestern Nova Scotia and the Province?

We welcome your feedback on this approach and look forward to your comments by Friday, February 17th, 2023. Please send your feedback to Derek Harvey, Director of Policy and Legislation with the Department of Public Works at derek.harvey@novascotia.ca.

Yours truly,

Peter Hackett, P.Eng.

Deputy Minister



Report to Council February 7, 2023

This Report to Council is intended to provide the Mahone Bay Town Council with a high-level summary of staff progress towards Council's direction to staff. As per the Town Council Policy, the report will be provided at each regular meeting of Council. The Report to Council is a living document and will improve and expand to incorporate new source documents as approved, and to respond to feedback received from Council.

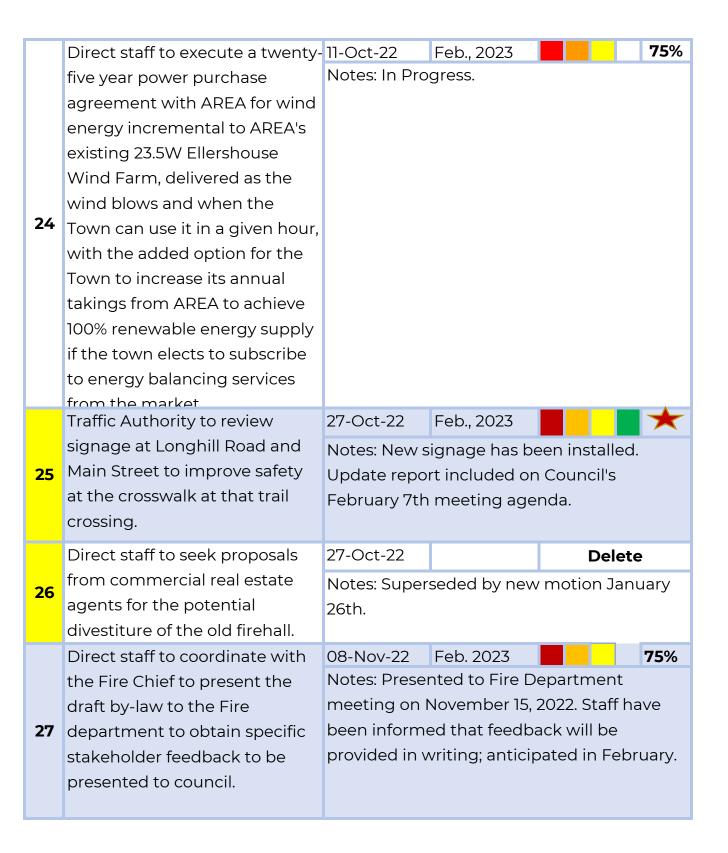
Goal	Objective	Assigned	Target	% Completion
Coui	ncil Assignments to Staff			
1	Staff amend the Respectful Workplace Policy and/or Employee Conduct Policy to reflect points raised in review of the draft Violence in the Workplace Policy specific to Town employees and recommend to Council.	08-Sep-20 Notes: To be Committee's		Policy & Strategy h meeting.
2	Staff to develop a multi-year bench installation program with potential locations being decided on in consultation with the Age Friendly Community Committee in alignment with the CBCL Transportation Plan Report and Accessibility Standards.	Notes: In progress. Staff have consulted accessibility coordinator and the Town's insurer (with respect to public benches or private property). Suppliers have been identified. Staff also discussed with MBT executive who expressed support for the program. Report to Council anticipated to Council's Feb 23rd.		nd the Town's Iblic benches on Is have been Issed with MBTCC Issupport for the

3	Staff to initiate discussion with MODL Planning staff and prepare a report for Council about the possibility of intermunicipal collaboration between the Town of Mahone Bay and MODL on the topic of housing in the preparation of their respective planning	Notes: In progress. Discussion initiated with MODL Planning staff. Timeline coordinated with Plan Mahone Bay process.			
4	documents. Direct staff to include accessible hearing solutions in the Accessibility Operational Plan, anticipated in 2021-22	25-Mar-21 Notes: Will be Operation Plants Accessibility coordinate the Operational Immunicipalities Operational In Accessibility meeting on Immunicipality	an. Lunenbur Coordinator i ne developme Plans for Lune es. Draft Acce Plan will be p Coordinator a	rg County s working rent of Acce enburg Co ssibility resented b at Council's	to essibility unty
5	Staff to apply to the Canada Healthy Communities initiative and the Canada Cultural Spaces Fund to sponsor Phase 3 improvements to the Michael O'Connor Memorial Bandstand Staff to initiate a Home	08-Jun-21 Notes: Canac Initiative app approval. Car application w implementat	lication did n nada Cultural vill be submit	ot receive Spaces Pr ted for	ogram
6	Charger Pilot Program for electric vehicle owners under the Grow the Load Initiative.	Notes: In Prowith AREA st program. Ass inform progr 2022.	gress. Town s aff on develo sociated resid	pment of p lents surve	oilot y to

	Staff to produce a report on the		Mar., 2023			50%
7	Town's Procurement Policy.	Notes: Assigr	ned to Mana	ger of F	inance	!
		(Treasurer), v	vill be preser	nted foll	lowing	
		annual audit				
	Staff to provide a report on the	29-Jul-21	Mar., 2023			75 %
8	Townsuite programs which	Notes: In pro	gress. Assigr	ned to N	/lanage	er of
•	may be relevant to the Town's	Finance (Trea	asurer), will k	oe prese	ented	
	operations.	following and	nual audit.			
	That minimum standards for	14-Sep-21	Jun., 2023			50%
	housing be reflected in any	Notes: Updat	te report cor	ncerning	g Hous	ing
9	housing strategy that the Town	Strategy dev	elopment ap	opeared	lon	
	may develop.	Council's Oct 27th meeting agenda.			nda.	
	Approve the reimbursement to	28-Oct-21	Mar., 2023			75 %
	Mr. Todd Nickerson in the	Notes: Reimbursement has been issued.			d.	
	amount of \$51,282.19 and direct	Staff continu	e to work or	n the ne	cessary	y
10	staff to undertake the	financial documentation to coordinate with				
10	necessary steps to conduct a	MODL.				
	joint tax sale with the					
	Municipality of the District of					
	Lunenburg.					
	Direct staff to issue an RFP for	28-Oct-21	Feb., 2023			75 %
	legal services.	Notes: Follow	ving the dete	erminat	ion tha	at
11		there is not a	n attractive	option t	to purs	ue a
		regional app	roach to cor	tracting	g legal	
		services, an F	RFP is expec	ted earl	y in 202	23.
	Staff to convene a Special	09-Nov-21	Mar., 2023	lict fall	Owing	75%
	Council meeting in the new	Notes: Return			J	oting
12	year to discuss the RCMP	cancellation to discuss RC	•	•		Ū
12	service that the Town contracts					
	through the Province.	contracts thr scheduled fo	_		Meetil	ıy
		scrieduled 10	ıı ıvıaıCı11/li	i, ZUZJ.		

13	Staff to develop draft protocols for the new community hall as an emergency shelter.		Mar., 2023 ow doing pre vith REMO rep n March.	_		
14	Staff to complete negotiation and establish terms and conditions whereby the Mahone Bay Soccer Club/Mahone Bay Centre will have a contractural responsibility to provide scheduling, management, and ongoing maintenance of the field and that same be provided to Council for	Soccer Club/ begin negoti managemen	Mar., 2022 have reached Mahone Bay (ations on the at agreement uncil in this re	Centre Soo draft and exped	ciety ct a	/to
15	Staff to proceed with the transportation project in the 2021-22 budget with the inclusion of the three-way stop at Pleasant Street and Main Street.	Notes: In progress. Improvement of crossings at Kedy's, Anglican Church, Medical Clinic, Long Hill Trail and Lutheran Church (pride crossing) completed. Speed humps have been installed on Pleasant St. and Fauxburg Rd., per Council's direction Sept 29th. Design work underway for reconfiguration of Pleasant/Main St. intersection. Update report included on Council's Feb 7th meeting agenda.				ed St. n
16	Staff to initiate discussions with the Nova Scotia Liquour Commission concerning potential cyclist and pedestrian safety improvements to their property on Main Street.	Liquour Com	Mar., 2022 n discussion v nmission. Repo n March.			50% tia

	Ctaff to propare a report on an	24-Mar-22	Mar 2027		50%
	Staff to prepare a report on an		Mar., 2023	l i.e. ele eft 201	
	Electric Vehicle car sharing		ates reflected		
17	program to be presented to		ıdget. Report		
	the Climate and Environment	· ·	ing meeting (of the Clima	ate and
	Committee.	Environment	Committee.		
	Council revisit the vaccination	28-Apr-22	Mar., 2023	Not yet l	oegun
18	policy by the end of the	Notes: To be	revisted in ea	rly 2023.	
	2022/23 fiscal year.				
	Staff to monitor the	14-Jun-22	Feb., 2023		75%
	effectiveness of the Town of	Notes: Staff h	nave reviewed	the by-law	; report
10	Lunenburg's updated Noise By-	anticipated f	or Feb 2023 a	fter the sun	nmer
19	law and report back to Council	season and in	n conjunction	with inforr	nation
	in the fall.	on noise by-l	aw best pract	ices as per	motion
		of Septembe	·		
	Council take no action for a	12-Jul-22	Feb, 2024	Not yet l	oegun
	further eighteen (18) months	Notes:	<i>'</i>	-	
20	, ,	110003.			
	regarding the discharge of MB-				
	DA2019-001.				
	Staff to reach out to MODL	14-Jul-22	Feb., 2023		50%
	staff to discuss any interest in	Notes: In Pro	gress.		
21	extending Town				
	water/wastewater services into				
	Mader's Cove.				
	Staff to review the current best	13-Sep-22	Feb., 2023		75%
	practices in the field of by-laws	Notes: Repor	t anticipated	in conjunct	ion
	referencing noise, with a view	with report o	n the Town o	f Lunenbur	g new
22	to developing a	Noise By-law	for Feb 2023.		
	recommendation to Council on	j			
	how to proceed with the				
	matter of noise regulations.				
	Defer the Ghaffari/Mahmoodi	11-Oct-22	Jun., 2023		25%
23		Notes: Prope	rty owners ha	ve been no	
23	the Plan Mahone Bay process.	the decision	-		



	Direct staff to consider the	08-Nov-22	Mar. 2023		25%
	recommendation of the PAB	Notes: Includ	led in external	consultan	ts
	respecting the right turn onto	review of Ma	in/Edgewater	Intersection	n
	Main Street from Edgewater	(contracted t			
28	Street in the preparation of the				
	anticipated future report that				
	staff has already been asked to				
	prepare.				
	Refer [request for Truth &	08-Nov-22	Mar. 2023		75 %
	Reconciliation crosswalk] to	Notes: Refere	enced in traffic	update re	port on
	the traffic authority and traffic	Council's Feb	7th meeting	agenda.	
29	authority to report back to				
29	Council to include discussion				
	with the local First Nation				
	Community and an				
	appropriate painted surface.				
	Revise the predesign for a	13-Dec-22	Mar., 2023		50%
30	public works garage capped at	Notes: In pro	gress.		
30	a maximum of \$1.5 million				
	inclusive of net HST.				
	inclusive of flet (15).				
	Inquire of the South Shore	13-Dec-22	Feb., 2023		75 %
			Feb., 2023 spondence ha	s been sen	
	Inquire of the South Shore	Notes: Corre			t and
	Inquire of the South Shore Regional Library Board about	Notes: Corres	spondence ha	e with Cou	t and
	Inquire of the South Shore Regional Library Board about the rationale for an	Notes: Corres	spondence hare the respons	e with Cou	t and
31	Inquire of the South Shore Regional Library Board about the rationale for an appointment to that Baord	Notes: Corres	spondence hare the respons	e with Cou	t and
31	Inquire of the South Shore Regional Library Board about the rationale for an appointment to that Baord and if there is a preference for	Notes: Corres	spondence hare the respons	e with Cou	t and
31	Inquire of the South Shore Regional Library Board about the rationale for an appointment to that Baord and if there is a preference for a community member or a	Notes: Corres	spondence hare the respons	e with Cou	t and
31	Inquire of the South Shore Regional Library Board about the rationale for an appointment to that Baord and if there is a preference for a community member or a member of Council, and on	Notes: Corres	spondence hare the respons	e with Cou	t and
31	Inquire of the South Shore Regional Library Board about the rationale for an appointment to that Baord and if there is a preference for a community member or a member of Council, and on receiving that answer that	Notes: Corres	spondence hare the respons	e with Cou	t and

	Review the Town of Mahone	10-Jan-23	Feb., 2023	Not yet begun	
32	Bay Alternative Voting By-law and provide Council with any suggested amendments to ensure clarity following the second election conducted	Notes:			
	using Alternative Voting Methods.				
	Coordinate with the Town's	10-Jan-23	Feb., 2023	75%	
33	Municipal Advisor to schedule a Governance in a Municipal Context training session with	Notes: Staff have started correspondence with interim Municipal Advisor, Andrea Hyslop, and will follow up regarding			
	DMAH staff.		date and tim		
	Consult with the Wooden Boat	10-Jan-23	Mar., 2023	50%	
	Society regarding possible	·	gress. Recom		
34	replacement of pump-out			Report to Council's	
34	station at the marina and	Jan Zoth me	eting (deferre	a to Feb 7th).	
	report findings and recommendations to council				
	as soon as nossible				
	Consult with the Wooden Boat	10-Jan-23	Mar., 2023	25%	
	Society regarding the	Notes: In pro	gress.		
35	possibility of seeking Blue Flag				
33	designation for the marina and				
	report findings and				
	recommnedations to council.				

36	Prepare a staff report including commerical real estate valuation of the property (old Firehall) for sale, the results of public expression of interest for the building and a proposal from staff including costs to renovate the building into a long-term public works facility for the April 11, 2023 Council meeting.	26-Jan-23 Notes: In pro	Apr., 2023 gress.	25%
37	Obtain legal confirmation on the ability of the Town to provide direct assistance to residents in the form of rebates to HOME Program participants and tax relief for Electrical Utility Bill Payment Program participants.	26-Jan-23 Notes:	Feb., 2023	50%
38	Provide Council with a report regarding the potential implementation of a marketing levy and interaction with the Provincial Short-Term Accommodation legislation.	26-Jan-23 Notes:	Apr., 2023	Not yet begun

	Prepare a report with	26-Jan-23	Mar., 2023	Not yet begun
	information for Council on the	Notes:		
	costs and potential funding			
	opportunities to cover logistics			
	such as the rental fees,			
39	opening reception, and			
	honoraria, for the Town to host			
	an exhibit of There is no one			
	Story of Black Girlhood: A			
	Series of Paintings by Rebecca			
	Fisk.			



Town of Mahone Bay

Staff Report RE: Marina Wharf January 26th, 2023

General Overview:

This staff report is intended to present Council with an update concerning the Town-owned wharf at the Mahone Bay Civic Marina.

Background:

At Council's regular meeting of July 28th, 2022 the following motion was passed (July 28th staff report attached as Appendix A):

THAT Council approve the addition of \$20,000 to the 2022-23 budget for a detailed condition assessment of the wharf at the Mahone Bay Civic Marina, with corresponding transfer from Gas Tax Reserve. Motion carried.

Pinto Engineering Ltd. were contracted to undertake the condition assessment.

In relation to capital work at the marina it should be further noted that at Council's regular meeting of January 10th, 2023 the following motion was passed:

THAT Council direct staff to consult with the Wooden Boat Society regarding possible replacement of the pump-out station at the marina and to report their findings and recommendations to Council as soon as possible. Motion carried.

Analysis:

The Civic Marina Assessment Report received from Pinto is attached as Appendix B to this report.

As noted in the Pinto report, the condition of the wharf isn't getting dramatically worse day-to-day, so while the condition of the wharf represents a pressing need, it still doesn't warrant emergency action and can be referred to Council's 2023-24 annual budget process.

Before the budget process begins staff will discuss the Pinto report with the Wooden Boat Society and local contractors, contemplating the scope of work which will be required in 2023-24. This should provide Council will additional perspective to support budget discussions.

Financial Analysis:

The final cost of the Civic Marina Assessment Report was \$19,801.50.

With respect to capital repairs to the wharf structure, a summary of the estimated costs for each option – excerpted from the attached report - follows:

- 1) Partial timber replacement: \$858,000
- 2) Complete replacement of timber cribs: \$4,861,000
- 3) New steel sheet piling bulkheads: \$3,025,000

Replacement of the pumping unit is estimated at \$12,000.

Staff have further observed the need for repairs to the boardwalk area adjacent to the Society's building, estimated at \$2,500.

Climate Analysis:

N/A

Strategic Plan:

N/A

Recommendation:

It is recommended,

THAT Council refer the replacement of the pumping unit, repairs to the boardwalk area, and capital repairs to the wharf structure to the 2023-24 budget.

Attached for Council Review:

- July 28, 2022 Staff Report re Marina Wharf Condition
- Civic Marina Assessment Report Pinto Engineering Ltd.

Respectfully Submitted,

Dylan Heide Town of Mahone Bay CAO



Town of Mahone Bay

Staff Report RE: Marina Wharf Condition July 28th, 2022

General Overview:

This staff report is intended to present Council with information and associated recommendation concerning the condition of the Town-owned wharf at the Mahone Bay Civic Marina.

Background:

In the Fall of 2021 Town staff were approached by representatives of the Mahone Bay Wooden Boat Society – operators of the marina – with concerns about the deterioration/rotation of cribwork on the Northwest side of the wharf. A limited engineering condition assessment was carried out on December 13th, 2021 (report attached as Appendix A). Staff have continued monitoring the Northwest side with the following results:

Measure				
Dates	Points of Measure			
	A B C			
Dec 16/21	8.5"	11.75"	9.5"	
Jan 17/22	8.25"	11.5"	9.5"	
Feb 23/22	8.625"	11.75"	9.5"	
Mar 21/22	8.625"	11.875"	9.5"	
April 19/22	8.5"	11.75"	9.5"	
May 16/22	8.5"	11.5"	9.375"	
June 20/22	8.25"	11.5"	9.25"	
July 18/22	9"	11.75"	9.625"	

Associated current pictures of the Northwest side taken by staff are attached as Appendix B.

Analysis:

Boats stored on the wharf by the marina operation over the winter of 2021-22 have now been launched leaving the area clear for detailed condition assessment as recommended in the attached report. Staff recommend undertaking this detailed assessment as soon as possible to inform repairs and/or possible usage restrictions to be imposed.

The proposed detailed assessment will attempt to determine the cause of the cribwork rotation by excavating to expose the cribs to assess the condition of the buried sections.

Since the most economical repair option would be the replacement of the deteriorated sections of cribwork, it will be necessary to complete an inspection of the cribwork below the tidal zone. If the cribwork is badly deteriorated below the tidal zone, replacement of the cribwork above will no longer be an option.

Following completion of the fieldwork, concept designs for repair options will be developed. If it is confirmed that repairs cannot be completed due to below water condition of the cribwork, replacement or other options will be looked at. Cost estimates will be completed for all options considered.

Financial Analysis:

The estimated cost of the detailed condition assessment is \$20,000. This cost is eligible to be funded from Gas Tax Reserve.

Climate Analysis:

N/A

Strategic Plan:

N/A

Recommendation:

It is recommended,

THAT Council approve the addition of \$20,000 to the 2022-23 budget with corresponding transfer from Gas Tax Reserve.

Attached for Council Review:

- Limited Engineering Condition Assessment Report, December 13th, 2021.
- Photos of Northwest side of Wharf.

Respectfully Submitted,

Dylan Heide

Town of Mahone Bay CAO



Town of Mahone Bay

Civic Marina Assessment Report



January 09, 2023



Town of Mahone Bay

Mahone Bay Civic Marina

Assessment Report

Table of Contents

1.0	INTRODUCTION	1
2.0	BACKGROUND INFORMATION AND CONSTRUCTION	2
3.0	CONDITION ASSESSMENT	3
3.1	Top of North Wall Displacements	3
3.2	Wharf Face Conditions	3
3.3	Wharf Face Plumbness	7
3.4	Test Pits	11
4.0	REPAIR OPTIONS	13
4.1	General	13
4.2	Partial Replacement	13
4.3	Complete Replacement with New Timber Cribwork	14
4.4	Steel Sheet Pile Bulkheads	14
5.0	COST ESTIMATES	16
5.1	General	16
5.2	Partial Replacement	16
5.3	Complete Replacement with New Cribwork	18
5.4	Steel Sheet Pile Bulkheads	19
6.0	SLIMMARY	20

APPENDIX A DRAWINGS
APPENDIX B PHOTOGRAPHS

APPENDIX C DIVING INSPECTION VIDEO

1.0 INTRODUCTION

Malcolm PINTO Engineering Limited (PINTO) completed an assessment of the Mahone Bay Civic Marina Wharf that included an above and below water inspection of the exposed face of the existing timber cribwork structures. The back wall of the cribwork was also inspected at two locations that were exposed by excavation. The below water diving work was carried out by Connors Diving Services and the excavation work was completed by S. W. Barry Construction Limited.

The wharf assessment was initiated by the Town of Mahone Bay due to concerns regarding stability of the timber cribwork resulting from visible outward displacement of the timber cribwork on the north face of the wharf. An initial visual inspection was completed by PINTO on December 13, 2021, to determine if repairs were required to ensure the structure would survive the winter months while boats were stored in the marina yard behind the timber cribwork. Based on that visual inspection, it was recommended that the north wharf face be monitored to determine if any additional outward displacements occurred over the winter months and, subsequently, monthly measurements were made by the Town at three points along the wharf face.

A site visit that included the diving inspection was carried out on September 16, 2022, and the remaining work, including the excavation to expose the back face of the cribwork, was completed on Oct 03, 2022. The below water diving inspection included a visual inspection of all three faces of the timber cribwork wharf and a plumb line was used to measure the out-of-plumbness of the crib walls at several locations on the north and east wall faces, over the full crib height.

Based on site measurements, an existing layout was prepared and is included as Drawing S101 in Appendix A. Preliminary concept plans and sections of repair options are also included in Appendix A. A series of photographs is included in Appendix B showing typical construction and areas of deterioration, and a video of the diving inspection is included as Appendix C.

2.0 BACKGROUND INFORMATION AND CONSTRUCTION

The cribwork wharf was constructed with 200 mm x 200 mm (8" x 8") creosoted timber members and was assembled in three sections or cribs as shown on the plan in Appendix A. The three crib sections would have been partially constructed on land and then floated into place and filled with ballast to sink. The crib joints shown on the plan are only evident below water or at lower tide levels. After sinking, the top tiers of timber would have been constructed in place, with a single line of cross ties placed over the crib joints so that the joints do not continue up to the top of the cribwork. The cribs were constructed with a closed front face. The excavation of the crib back wall revealed open faced construction. Closed face differs from open face with the addition of infill timbers between the ends of the protruding cross ties. Closed face construction is used in areas where ice could damage the open face cribwork. Also, closed face cribwork allows the use of smaller ballast material that would otherwise fall out through the openings between the main longitudinal members.

The timber cribs on the north and south sides (Cribs 1 and 3) have a width between 6.1 m and 6.4 m (20' and 21') and these cribs are two cells in width. Crib 2 on the east side has a width of 7.3 m (24') and is three cells in width. Along the length of the wharf, the cell lengths vary between 2.4 m and 3.15 m (7.9' and 10.3'), measured center to center of the cross ties.

For the purposes of this report, an elevation at the top of the cribwork was estimated based on measured tide levels versus published tide levels. This method is frequently used when there are no existing drawings or survey data available, however, its accuracy is sometimes questionable. As shown on the wharf section on Drawing S102, the top of cribwork (below timber curb) is assumed to be 3.30 m, based on Chart Datum.

The age of the cribwork is unknown. Repairs were completed on the south face of the wharf circa 2016 that included replacement of several courses of longitudinal crib members and infill timber, vertical binder posts, timber fenders and curbs. Many of the original cross ties remained in place.

The yard enclosed by the timber cribwork is used to store pleasure craft during the winter months and the boats have been kept back away from the face the wharf for safety and structural concerns.

3.0 CONDITION ASSESSMENT

3.1 Top of North Wall Displacements

Over the past year, the Town has made monthly measurements of the outward displacements on the north wharf face at three locations and a summary of these displacements is presented below in Table 1. Location B corresponds with the location of maximum observed displacement, between cross ties numbered 5 and 6 on the plan. Locations A and B are at the cross ties on either side of Location C, at cross ties numbered 6 and 5, respectively. Measurements were taken from a string line running between the ends of the wharf face and can be seen in Photo 3.

TABLE 1 – SUMMARY – MONTHLY DISPLACEMENT MEASUREMENTS

Date of	Lateral Displacement - inches (mm)				
Measurement	Location A	Location B	Location C		
Dec 2021	8.5" (215)	11.75" (298)	9.5" (240)		
Jan 2022	8.25" (210)	11.5" (292)	9.5" (240)		
Feb 2022	8.625" (220)	11.75" (298)	9.5" (240)		
Mar 2022	8.625" (220)	11.875" (302)	9.5" (240)		
April 2022	8.5" (215)	11.75" (298)	9.5" (240)		
May 2022	8.5" (215)	11.5" (292)	9.375" (238)		
June 2022	8.25" (210)	11.5" (292)	9.25" (235)		
July 2022	9" (230)	11.75" (298)	9.625" (245)		
Aug 2022	8.25" (210)	11.625" (295)	9.5" (240)		
Sept 2022	8.25" (210)	11.5" (292)	9.25" (235)		
Oct 2022	9" (230)	11.75" (298)	9.5" (240)		
Nov 2022	-	-	-		
Dec 2022	9.5" (240)	12" (305)	9" (230)		

The measurements fluctuate by 1.25'' (32 mm) at location A, 0.5'' (13 mm) at Location B and 5/8'' (16 mm) at Location C. These measurements do not reveal significant movements in the crib face over that time period.

3.2 Wharf Face Conditions

The results of the below water inspection on each of the three timber wharf faces are summarized in Tables 2 to 4 below. Locations are referenced to the cross tie line number on each wharf face, as shown on the wharf plan in Appendix A. The diving video also uses the same reference system. There are two types of longitudinal face members referenced in the tables. The first type are the main longitudinal members that are referred as "main member" and the second type are the infill pieces between the main members and are referred to as "infill member".

TABLE 2 – SUMMARY – SOUTH FACE TIMBER CONDITION

Location	Condition
Cross Ties 3	First cross tie from seabed: severe end rot, probe penetrated 570
	mm into end of tie.
Cross Ties 4	Third cross tie from seabed: severe end rot, probe penetrated 550
	mm into end of tie.
Between Ties 4 and 5	Tenth tier from seabed: infill member deteriorated along length.
Cross Ties 5	Third cross tie from seabed: severe end rot, probe penetrated 420
	mm.
	Fourth cross tie from seabed: : severe end rot, probe penetrated
	470 mm.
	Fifth cross tie from seabed: severe end rot.
	To east side of crib joint, a mound of fine material approx. 800 mm
	height x 1400 mm length x 2000 mm width out.
Between Ties 5 and 6	Fourth tier from seabed: infill member at least 50% gone.
Between Ties 6 and 7	Fourth tier from seabed: main member 900 mm long deteriorated
	area with 70 mm min. penetration.
Cross Ties 7	Sixth cross tie from seabed: longitudinal crack.
Between Ties 7 and 8	Third tier from seabed: main member small area of deterioration.
	Fifth tier from seabed: main member small area with 50% loss.
	Eighth tier from seabed: infill member 1000 mm long deteriorated
	area, 80 mm penetration.

TABLE 3 – SUMMARY – EAST FACE TIMBER CONDITION

Location	Condition
South Corner	• 11 th tier from seabed: main member end split depth 300 mm min.
Between Corner and Ties 2	 Bottom tier at seabed: main member deterioration 1200 mm long depth 110 mm. 11th tier from seabed: main member area of deterioration 600 mm long x 60 mm depth. 13th tier from seabed: main member area of deterioration 1400 mm long x 120 mm depth.
Between Ties 2 and 3	 Bottom tier at seabed: main member full length deterioration min 100 mm depth. Third from seabed: main member full length deterioration close to full width.

TABLE 3 (Cont'd) – SUMMARY – EAST FACE TIMBER CONDITION

Second tier from seabed: Infill member 1300 long area of deterioration with min. 100 mm depth. Fourth tier from seabed: main member full length severe deterioration, min depth 120 mm. Between Ties 4 and 5 Tenth tier from seabed: Infill member 900 mm long deterioration 60 mm depth. Fourth tier from seabed: infill member 900 mm long deterioration 120 mm depth. 11th tier from seabed: main member full length deterioration 80 mm depth. 12th tier from seabed: Infill member 600 long deterioration full depth. 13th tier from seabed: main member 600 long deterioration 70 mm depth. 15th tier from seabed: main member 100 long deterioration 60 mm depth. (Approx. 21 tiers crib height from seabed at this location) Between Ties 6 and 7 Sixth tier from seabed: main member full length deterioration, close to full depth, bad between cross ties on Line 6. Sixth tier from seabed: infill member 2300 mm long
Fourth tier from seabed: main member full length severe deterioration, min depth 120 mm. Tenth tier from seabed: Infill member 900 mm long deterioration 60 mm depth. Fourth tier from seabed: infill member 900 mm long deterioration 120 mm depth. 11th tier from seabed: main member full length deterioration 80 mm depth. 12th tier from seabed: Infill member 600 long deterioration full depth. 13th tier from seabed: main member 600 long deterioration 70 mm depth. 15th tier from seabed: main member 100 long deterioration 60 mm depth. (Approx. 21 tiers crib height from seabed at this location) Between Ties 6 and 7 15th tier from seabed: main member full length deterioration, close to full depth, bad between cross ties on Line 6.
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Fourth tier from seabed: infill member 900 mm long deterioration 120 mm depth. 11 th tier from seabed: main member full length deterioration 80 mm depth. 12 th tier from seabed: Infill member 600 long deterioration full depth. 13 th tier from seabed: main member 600 long deterioration 70 mm depth. 15 th tier from seabed: main member 100 long deterioration 60 mm depth. (Approx. 21 tiers crib height from seabed at this location) Between Ties 6 and 7 15 th tier from seabed: main member full length deterioration, close to full depth, bad between cross ties on Line 6.
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80 mm depth. • 12 th tier from seabed: Infill member 600 long deterioration full depth. • 13 th tier from seabed: main member 600 long deterioration 70 mm depth. • 15 th tier from seabed: main member 100 long deterioration 60 mm depth. (Approx. 21 tiers crib height from seabed at this location) • 15 th tier from seabed: main member full length deterioration, close to full depth, bad between cross ties on Line 6.
 12th tier from seabed: Infill member 600 long deterioration full depth. 13th tier from seabed: main member 600 long deterioration 70 mm depth. 15th tier from seabed: main member 100 long deterioration 60 mm depth. (Approx. 21 tiers crib height from seabed at this location) Between Ties 6 and 7 15th tier from seabed: main member full length deterioration, close to full depth, bad between cross ties on Line 6.
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location) Between Ties 6 and 7 • 15 th tier from seabed: main member full length deterioration, close to full depth, bad between cross ties on Line 6.
• 15 th tier from seabed: main member full length deterioration, close to full depth, bad between cross ties on Line 6.
close to full depth, bad between cross ties on Line 6.
Retween Ties 7 and 8 Sixth tier from cashed: infill member 2200 mm long
deterioration, close to full depth.
Seventh tier from seabed: main member 1000 mm long
deterioration 110 mm depth.
Tenth tier from seabed: infill member 1800 mm long
deterioration full depth.
12 th tier from seabed: infill member 1400 mm long deterioration full depth
deterioration full depth. • 15 th tier from seabed: main member 1200 mm long
deterioration 90 mm depth.
Cross Ties 8 • Crib joint. Some fine material lost and on seabed.
Between Ties 8 and 9 • Fourth tier from seabed: infill member 500 mm long
deterioration 70 mm depth.
11 th tier from seabed: main member 2800 mm long
deterioration 120 mm depth, extending to between cross ties
at each end.
• 19 th tier from seabed: main member large split full length
extending to between cross ties on Line 8.
Cross Ties 9 • 11 th cross tie from seabed: end splitting
Between Ties 9 and Corner • 12 th tier from seabed: main member 2700 mm long section loss
110 mm depth, extending to between cross ties on Line 9.

TABLE 4 – SUMMARY – NORTH FACE TIMBER CONDITION

Location	Condition
East Corner	11 th butt end from seabed: end rot.
Between Corner and Ties 2	Ballast floor is fourth tier visible above seabed.
	• 4 th tier from seabed: infill member section loss 1800 mm long,
	50 mm height and 110 mm depth.
	• 21 st tier from seabed: infill member section loss 1400 mm long,
	110 mm height and 50 mm depth.
Cross Ties 2	
Between Ties 2 and 3	• Second tier above ballast floor: infill member section loss 1500
	mm long (continuing into seabed) 160 mm height and 120 mm
	depth.
Cross Ties 3	• 8 th cross tie from seabed end splitting and deterioration.
	• 9 th cross tie from seabed: end rot.
Between Ties 3 and 4	Sixth tier from seabed: infill member section loss 900 mm long
	70 mm height and 150 mm depth.
	Tenth tier from seabed: infill member full length section loss
	150 mm height 130 mm depth.
Cross Ties 4	Ninth cross tie from seabed: end splitting and end rot.
Between Ties 4 and 5	Third tier from seabed: infill member section loss 2000 mm
	long (extending into seabed) 140 mm height 100 mm depth.
	Fourth tier from seabed: main member severe deterioration
	2000 mm long 60 mm height 80 mm depth
Cross Ties 5	Sixth cross tie from seabed: some splitting and end rot.
Between Ties 5 and 6	• 14 th tier from seabed: infill member full length splitting
	• 15 th tier from seabed: main member deterioration between
	cross ties on Line 5, 800 mm long 100 mm height 60 mm depth.
Cross ties 6	Fourth cross tie from seabed: end rot.
	Sixth cross tie from seabed: end rot.
Between Ties 6 and 7	• 11 th tier from seabed: main member deterioration 900 mm
	long full height.
Cross Ties 7	 Fifth cross tie from seabed: end splitting.
	• Sixth cross tie from seabed: split 200 mm depth.

The tables above show that there are some severely deteriorated timber members located in the lower tidal zone and below. The upper tidal zone and above was reviewed above water and conditions are discussed below.

The south face of the wharf was partially reconstructed circa 2016, as can be seen in Photo 4. The top eleven tiers of face timbers, including main members and infill members, were replaced between Cross Ties Lines No. 1 and 5. Between No. 5 and the corner, less than eleven tiers were replaced, as shown in Photo 5. Binder posts behind the front face timbers were also replaced and all new main longitudinal members were bolted to the binder posts.

The original cross ties were incorporated into the rebuild and some tie ends are in a severely deteriorated condition, as shown in Photo 6.

On the West face, the top two tiers of timber were previously replaced, as well as the curbs.

3.3 Wharf Face Plumbness

During the diving inspection, a weighted line was used to measure the out-of-plumbness of the wharf face at four locations on the north side of the wharf and at three locations on the east side. These locations are shown on the plan in Appendix A. Table 5 below shows the offsets at each tier of timber from the seabed to the top member at each location. Tier No. 1 represents the first tier above the seabed. Location 2 is coincident with the area of maximum outward displacement at the top of the cribwork on the north face, one of the locations that was monitored for displacement over the previous months by the town. For comparison purposes, Location 4 corresponds with the start of the section of cribwork wall that visually appeared to be fairly plumb.

TABLE 5 – SUMMARY – WALL PLUMBNESS

Location	Tier	Offset	Location	Tier	Offset
	Number	(mm)		Number	(mm)
P1			P2	21	360
(North face, 4.6	20	330	(North face, 7.8	20	305
m from West	19	320	m from West	19	295
corner)	18	300	corner)	18	285
	17	270		17	265
	16	260		16	260
	15	250		15	260
	14	250		14	200
	13	230		13	150
	12	205		12	150
	11	180		11	150
	10	170		10	150
	9	140		9	130
	8	140		8	120
	7	100		7	80
	6	80		6	70
	5			5	40
	4			4	40
	3	20		3	35
	2			2	5
	1	0		1	0

TABLE 5 (Cont'd) – SUMMARY – WALL PLUMBNESS

Location	Tier	Offset	Location	Tier	Offset
	Number	(mm)		Number	(mm)
P3			P4	26	45
(North face,			(North face,	25	45
10.4 m from			13.8 m from	24	45
West corner)			West corner)	23	30
	22	245		22	30
	21	215		21	30
	20	200		20	30
	19	210		19	30
	18	210		18	20
	17	190		17	20
	16	180		16	20
	15	160		15	20
	14	160		14	20
	13	140		13	20
	12	130		12	10
	11	130		11	20
	10	120		10	10
	9	110		9	10
	8	90		8	
	7	80		7	20
	6	70		6	30
	5	60		5	30
	4	60		4	30
	3 2	50		3	30
	2	10		2	20
	1	0		1	0

. TABLE 5 (Cont'd) – SUMMARY – WALL PLUMBNESS

Location	Tier	Offset	Location	Tier	Offset
	Number	(mm)		Number	(mm)
P5			P6	27	465
(East face, 5.3 m			(East face, 10.5	26	440
from North	25	330	m from North	25	425
corner)	24	310	corner)	24	400
	23	290		23	395
	22	280		22	375
	21	290		21	340
	20	205		20	340
	19	190		19	320
	18	190		18	300
	17	180		17	290
	16	170		16	280
	15	160		15	270
	14	160		14	220
	13	150		13	220
	12	140		12	180
	11	120		11	180
	10	110		10	170
	9	100		9	140
	8	90		8	110
	7	100		7	90
	6	80		6	60
	5	70		5	40
	4	60		4	30
	3	50		3	20
	2	30		2	10
	1	0		1	0

TABLE 5 (Cont'd) – SUMMARY – WALL PLUMBNESS

Location	Tier	Offset
	Number	(mm)
P7	28	260
(East face, 17.4	27	245
m from North	26	245
corner)	25	235
	24	200
	23	185
	22	160
	21	150
	20	150
	19	140
	18	140
	17	140
	16	130
	15	120
	14	120
	13	120
	12	90
	11	90
	10	90
	9	90
	8	80
	7	70
	6	50
	5	40
	4	40
	3	30
	2	10
	1	0

At Location 2, which corresponds to Point B in the monthly measurements taken over the past year, the maximum outward displacement at the top of the cribwork wall face with respect to the lowest crib members above seabed or mudline was measured to be 360 mm. When measured from the straight line between each end of the wharf face, the displacement as measured during the previous year is about 300 mm (11.75") and hasn't changed significantly over that time period. The difference between the two measurements is only 60 mm. The measured displacements shown in the table at Location 2 indicate that the face of the cribwork is a fairly constant slope over the height of the cribwork and the wall does not rotate about a point above the seabed. At Locations 1 and 3 on either side of Location 2, the wall is also sloped over the entire height, with maximum displacements of 330 mm and 245 mm, respectively. At Location 4, where the wall face appeared to be fairly plumb, measurements did show that this was the case. Between this location and the East end of the wharf face, the wall is fairly plumb.

On the east face, the plumb line measurements also show that the entire crib face is rotating outward from the base, similar to the north face. At Location 6, the maximum outward displacement, relative to the lower crib members at the seabed, was measured to be 465 mm, an even greater lateral displacement than the worst location on the north face. Maximum displacements at the plumb line locations on either side were 330 mm and 260 mm.

3.4 Test Pits

Two test pits were excavated to expose the back wall of the timber cribwork. The first pit (Photos 15 and 16) was located near the area on the north face experiencing the maximum lateral displacement. The top cross tie at Line 5 was also exposed for inspection. The pit had an approximate depth of 1.9 metres and the ends of four cross ties and five longitudinal members were exposed. As can be seen in the photographs, there are no infill timbers between the main longitudinal members in the back wall and the exposed timbers are still heavily creosoted. The top four tiers of timber were in poor condition (Photos 17 to 19) and two tiers below that showed some signs of deterioration. The vertical binder post was in bad condition over the same height and, as can be seen in Photo 20, the top is severely deteriorated. Hammer soundings on the exposed cross tie seaward of the binder post indicated some interior loss of section.

The exposed back wall was roughly checked for plumbness and was found to be leaning seaward by 25 to 40 mm over a height of 1,800 mm. Over that same height, the front wall face on that line is leaning outward approximately 160 mm, resulting in a difference of 120 mm to 135 mm. This shows that the cribwork is not rotating as a unit since the front face is at a steeper slope than the back face.

The top cross tie was exposed at both ends and at the center of the crib to confirm the condition of the timber and to determine if the crib was pulling apart due to rot at the fasteners. As can be seen in Photo 21, the cross tie is fastened to the intermediate longitudinal member with one drift bolt and there is no vertical binder post at the intersection. Binder posts along the intermediate longitudinal members and cross ties would have provided increased rigidity to the cribwork structure. Hammer soundings revealed that the cross tie had some interior deterioration, however, there did not appear to be any crushing around the drift bolt.

Along the same cross tie line, the top of the binder post behind the front face was exposed. As shown in Photo 22, the top of the post is severely deteriorated and the top longitudinal member has pulled away from the post leaving a gap of about 95 mm. The top longitudinal member would have been fastened to the cross tie with a drift bolt, therefore, the bolt would have had to pull through the cross tie to achieve that large gap width. Longitudinal members are usually bolted to the binder posts but the post is too short for the top member to be bolted to, as can be seen in Photo 22. Also, not all longitudinal members are bolted to the binder posts. On the back wall exposed in the test pit, only every second longitudinal member is bolted to the binder post. On the front face on cross tie line 6, the binder post

is visible, as shown in Photo 12, and there are no bolts between the longitudinal members and binder post.

Test Pit 2 was located between Cribs No. 1 and No. 2, as shown on the plan in Appendix A. As noted previously, the plan shows a joint between the two cribs, however, the cribs were constructed as a single unit above the floated-in crib sections and the main longitudinal backwall member of Crib No. 1 is coincident with the cross tie in Crib No. 2, as can be seen in Photo 23. The top member appeared to be in good condition but soundings on the member below revealed some interior rot.

4.0 REPAIR OPTIONS

4.1 General

There are limited repair options for timber cribwork construction. Since successive members are fastened to each other with drift bolts/pins, isolated deteriorated members cannot be removed and replaced with new members. The only way to replace a member is to remove all members above it and replace with new. Therefore, the only repair option is to replace the cribwork down to a specified level, similar to what was replaced in the 2016 repairs on the south face.

Other options include complete replacement of the cribwork structure with a new wharf structure, or the construction a new wall around the perimeter of the site. Alternatives for new replacement structures include new timber cribwork similar to the existing structure; new concrete cribs; or a new piled structure with suspended deck on pile caps. Concrete cribs are constructed on land, floated to the site, sunk in place and backfilled. A suitable site is required to construct the cribs on dry land that can be later flooded to float the cribs after construction. As such, this alternative will not be considered as a viable option for this site. Complete replacement with new ballasted timber cribwork will be considered as an alternative for comparison purposes.

It is common to drive a new steel sheet pile bulkhead in front of existing deteriorated cribwork and that option will be discussed below.

4.2 Partial Replacement

The partial replacement/repair option would be the least disruptive option for the marina. The repairs that were completed in 2016 on the south face included the replacement of the top eleven tiers of timber over a large portion of the wharf face. Depending on the accuracy of the assumed top of cribwork elevation of 3.30 m, the new timber begins at an approximate elevation of 1.10 m above Chart Datum, in the mid-tidal range. A review of the tide charts for Mahone Bay reveal that the tide would be below that level for an average of 5 hours per tide cycle (12 hrs 25 mins +/-). If an additional tier were to be replaced, the tide would be below the new level for an average of 3 to 4 hours per tide cycle. If an additional two tiers, or 13 total, were removed, the average time that tide levels would be below that level would likely be less than two hours. With the decrease in time that the top of the lowest work level is exposed above water level, the more difficult it would be for a contractor to complete the work. Therefore, the number of tiers of timber that could be replaced would be in the order of 11 or 12.

Although an expected life span for CCA treated timber for use in the marine environment may be upwards of 25 years, this new timber will be constructed on and mixed with existing timber and, therefore, the expected life from the repaired structure will be limited to the expected life of the existing remaining timber. As noted previously, there are some badly deteriorated crib members located below the proposed limit of replacement. Also, only the

uppermost cross ties can be replaced without additional replacement of non-deteriorated timber members within the buried sections of cribwork. Removal of ballast material from inside cribwork cells would be difficult without damaging the surrounding timber members. As shown in the cross section on Drawing S102, some partial replacement of cross ties can be carried out within the repair area by cutting off the deteriorated ends and splicing in new members. With the partial replacement option, the life of the existing wharf facility could be extended by up to 10 years, however, deterioration of remaining members below the replaced face timbers could result in localized ballast material loss through openings in the cribwork and crushing of deteriorating members may result in localized displacements.

4.3 Complete Replacement with New Timber Cribwork

Complete replacement with new ballasted timber cribwork will require removal of all existing cribwork, levelling the seabed with a crushed stone mattress, floating in and sinking new cribwork and constructing the upper tiers in place. The partially completed cribwork will need to be constructed near the site where they can be pushed or rolled into the water and floated into place. For the purposes of this report, the same cribwork dimensions will be used and a stepped bottom for the north and south cribs will be assumed based on existing seabed slopes. A geotechnical investigation would be required to determine elevations of existing suitable bearing material and/or existing crushed stone mattress.

The existing creosoted cribwork will need to be properly disposed of. On previous projects, this material was accepted at the Chester Landfill facility. Existing suitable ballast and backfill materials can be stockpiled for reuse in the new construction.

4.4 Steel Sheet Pile Bulkheads

Installation of steel sheet piling bulkheads seaward of existing deteriorated timber cribwork is a common repair alternative that has been previously carried out in Halifax Harbour. A plan of the steel sheet piling option is included as Drawing S103 in Appendix B and a cross section is shown on Drawing S104. The footprint for the new yard is based on the dimensional layout of steel sheet pile pairs that will allow for the complete enclosure of the existing timber cribwork. The space between the new piling bulkheads and existing timber cribwork will be filled with clear stone. The existing timber cribwork and ballast would be removed down to the level shown on the cross section, as well as the backfill material outside the cribwork, so that the new tie rods can be installed.

The preliminary concept design for this option assumes that undisturbed native till material will be encountered not far below the existing seabed, since timber cribwork could not be founded on a layer of soft marine sediments. Also, it was assumed that there will be sufficient depth of material above bedrock to allow installation of piling to the required depths as shown. Before the design can be advanced further, these two assumptions would need to be verified through a geotechnical investigation. If bedrock is not located at a sufficient depth to allow for pile installation, the proposed concept design will not be

feasible and expensive toe pins would need to be drilled into the bedrock to prevent the sheet piling from kicking out at the tip.

It is preferable to add a concrete copewall or cap to the top of the new bulkhead wall but that was omitted from the concept design to decrease costs. With regards to sheet pile selection, piles with web and flange thicknesses of at least ½" (12.7 mm) are commonly specified to increase the expected service life of the bulkhead. The concept design shows an AZ18 section that has a thickness of 9.0 mm. The section can be upsized to an AZ26 with a thickness of 12.2 mm for additional service life. Using an assumed thickness loss due to corrosion of 0.3 mm per year in the tidal and splash zones, holes can be expected in the AZ18 piling within 30 years or less and within 40 years or less for the AZ26 piling section. The addition of cathodic protection by welding on sacrificial anodes to the sheet piling below the low tide level will slow rate of corrosion, particularly below the tidal zone and within the lower tidal zone. Without the addition of a concrete copewall extending below the tidal zone or protective coatings, cathodic protection is recommended.

5.0 COST ESTIMATES

5.1 General

Cost estimates for the three options are presented below. A contingency allowance of 20% has been added to each option due to the preliminary nature of the designs and limited geotechnical information for the replacement alternatives. Costs for geotechnical investigations have been included, however, engineering and project management costs have not.

5.2 Partial Replacement

The cost estimate for the partial replacement of the timber cribwork is presented in Table 6 on the following page. As discussed above, the estimate is for the replacement of the top 11 tiers of timber on the crib faces on the north and east sides, with replacement of the top tiers in the back wall as required. This work would have to be awarded as a unit price contract and all members that require replacement behind the front face would need to be verified in the field after exposure by excavation. This work could also be broken into separate contracts with the two wharf faces being completed over two years for budgeting purposes, although it would be more economical to complete under a single contract.

TABLE 6 – COST ESTIMATE – PARTIAL CRIBWORK REPLACEMENT

ITEM NO.	DESCRIPTION OF WORK	UNIT OF MEASURE	ESTIMATED QUANTITY (a)	UNIT PRICE (b)	EXTENSION (a x b)
1	Mobilization/Demobilization	L.S.	1	\$50,000	\$50,000
2	Demolition and Removals a) Timber Cribwork b) Ballast c) Other (including Fenders)	m³ m³ L.S.	45 330 1	\$1,100 \$150 \$10,000	\$49,500 \$49,500 \$10,000
3	Excavation (behind and above Cribwork)	L.S.	1	\$25,000	\$25,000
4	Remove and Reinstate Rock Armour	L.S.	1	\$10,000	\$10,000
5	New Timber Crib Members	m³	50	\$7,000	\$350,000
6	Timber Curb	L.S.	1	\$17,000	\$17,000
7	Re-install Crib Ballast	m³	330	\$200	\$66,000
8	Backfill and Granulars	L.S.	1	\$25,000	\$25,000
9	New Ladders	ea.	4	\$1,200	\$4,800
10	Bollards	ea.	6	\$3,000	\$18,000
11	Reinstall Gangway and Receiver	L.S.	1	\$15,000	\$15,000
12	Silt Curtain - Environmental	L.S.	1	\$25,000	\$25,000
	SUBTOTAL				\$714,800
	Contingency 20%		-		\$142,960
	TOTAL				\$858,000

5.3 Complete Replacement with New Cribwork

The cost estimate for complete replacement of the existing timber cribwork with similar construction is presented in Table 7 below. The existing suitable crib ballast and backfill materials can be stockpiled off-site for reuse in the new construction.

TABLE 7 – COST ESTIMATE – COMPLETE CRIBWORK REPLACEMENT

NO.	DESCRIPTION OF WORK	UNIT OF MEASURE	ESTIMATED QUANTITY (a)	UNIT PRICE (b)	EXTENSION (a x b)
1	Mobilization/Demobilization	L.S.	1	\$100,000	\$100,000
2	Demolition and Removals	L.S.	1	\$250,000	\$250,000
3	Excavation and Dredging	L.S.	1	\$250,000	\$250,000
4	Remove and Reinstate Rock Armour and Stone Wall	L.S.	1	\$50,000	\$50,000
5	Crushed Rock Mattress	L.S.	1	\$100,000	\$100,000
6	New Timber Cribwork and Ballast	m³	1950	\$1,500	\$2,925,000
7	Timber Curb	L.S.	1	\$25,000	\$25,000
8	New Ladders	ea.	4	\$1,200	\$4,800
9	Reinstall Bollards	ea.	6	\$1,000	\$6,000
10	Backfill and Granulars	m³	1250	\$200	\$250,000
11	Reinstall Gangway and Receiver	L.S.	1	\$15,000	\$15,000
12	Silt Curtain - Environmental	L.S.	1	\$25,000	\$25,000
13	Timber Fendering	m³	7.2	\$7,000	\$50,400
	SUBTOTAL				\$4,051,200
	Contingency 20%		-		\$810,240
	Geotechnical Investigation	L.S.	1	\$10,000	\$10,000
	TOTAL				\$4,861,000

5.4 Steel Sheet Pile Bulkheads

The cost estimate for the steel sheet piling bulkhead option is presented in the table below. The estimate includes cost for the AZ18 pile section bulkhead. If the pile section is upsized for additional thickness for corrosion allowance, the price would increase by about \$150,000. If the pile section needs to be upsized due to geotechnical conditions, the cost estimate would need to be revised to account for increased pile lengths and changes to hardware requirements.

TABLE 8 - COST ESTIMATE - SSP BULKHEAD WALLS

NO.	DESCRIPTION OF WORK	UNIT OF MEASURE	ESTIMATED QUANTITY (a)	UNIT PRICE (b)	EXTENSION (a x b)
1	Mobilization/Demobilization	L.S.	1	\$250,000	\$250,000
2	Demolition and Removals	L.S.	1	\$150,000	\$150,000
3	Excavation	L.S.	1	\$110,000	\$110,000
4	Remove and Reinstate Rock Armour and Stone Wall	L.S.	1	\$50,000	\$50,000
5	Supply/Drive SSP – Bulkhead (AZ18-700)	m²	830	\$1,200	\$960,000
6	New Anchor Wall (AZ13-700)	m²	42	\$1,100	\$46,200
7	Tie rods, Wales, and Hardware	tonne	18.50	\$22,000	\$407,000
8	Concrete for Wale Encasement	m³	32	\$3,000	\$100,000
9	Timber Curb	L.S.	1	\$25,000	\$25,000
10	Backfill and Granulars	L.S.	1	\$300,000	\$300,000
11	New Ladders	ea.	4	\$1,200	\$4,800
12	Bollards and Concrete Bollard Blocks	ea.	6	\$4,000	\$24,000
13	Reinstall Gangway and Receiver	L.S.	1	\$15,000	\$15,000
14	Cathodic protection (20 yr. anodes)	ea.	48	\$1,200	\$57,600
	SUBTOTAL				\$2,499,600
	Contingency 20%		-		\$499,920
	Geotechnical Investigation	L.S.	1	\$25,000	\$25,000
	TOTAL				\$3,025,000

6.0 **SUMMARY**

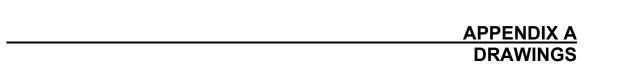
An existing condition assessment was completed on the timber cribwork at the Mahone Bay Civic Marina to determine the cause of outward movement of the crib face at the north side of the site and to look at repair options. The study included a below water diving inspection and excavation of test pits to expose the back side of the timber cribwork.

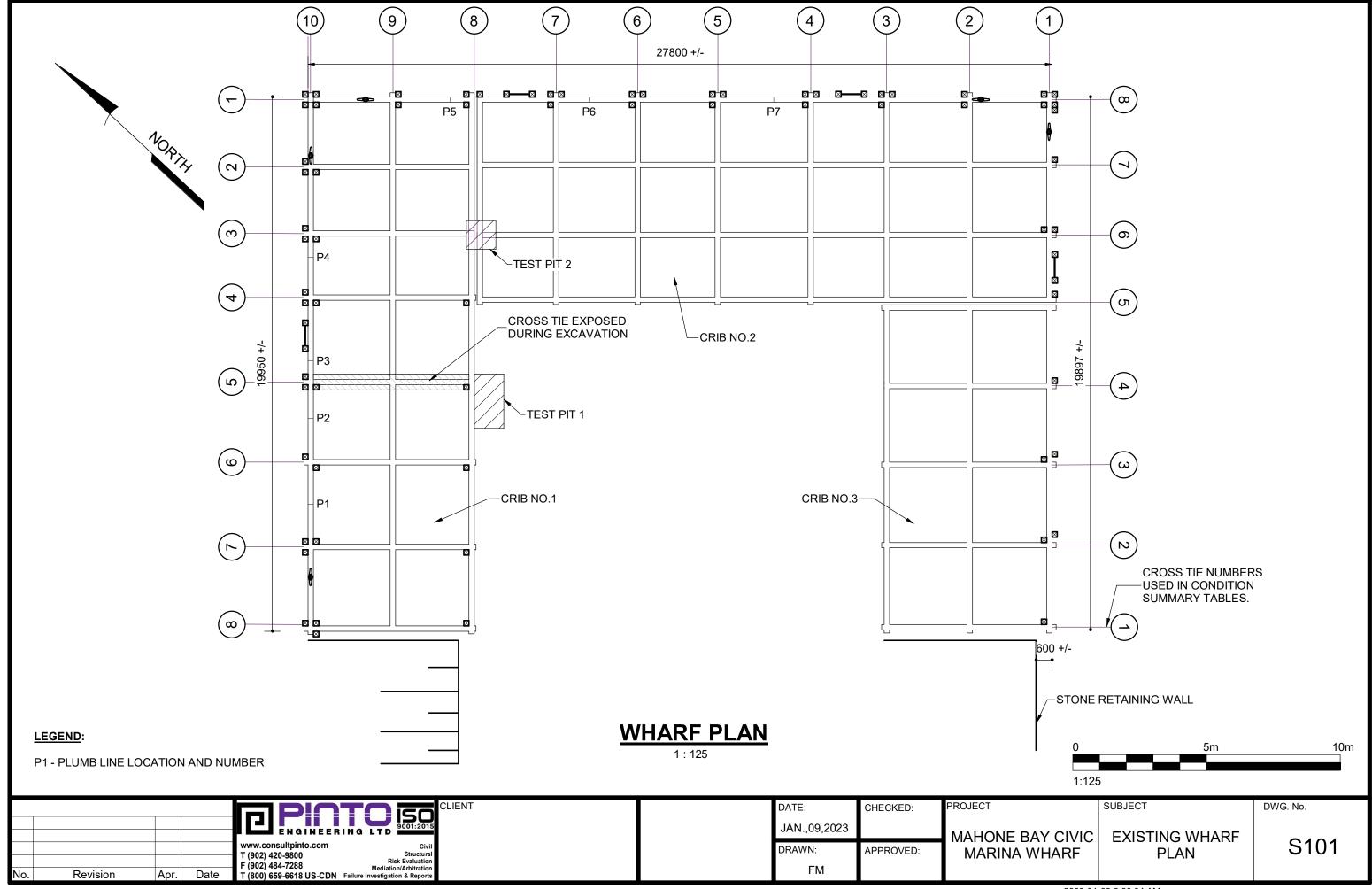
Plumb lines were used to measure the outward displacement of the cribwork at several locations on the north and east faces and it was revealed that the displacements occur over the entire height of the cribwork. The greatest displacements, at the top of the cribwork relative to the cribwork at the seabed, on the north and east faces were measured to be about 360 mm and 465 mm, respectively. A test pit excavated behind the cribwork near the location of maximum displacement on the north face found that the back face of the cribwork does not have the same seaward lean as the front face. Therefore, a large portion of the outward movement of the front face is likely due to timber deterioration and crushing at bolted connections. The timber face members on the north and east faces are severely deteriorated in the upper tidal and splash zones and there are also deteriorated members below these levels.

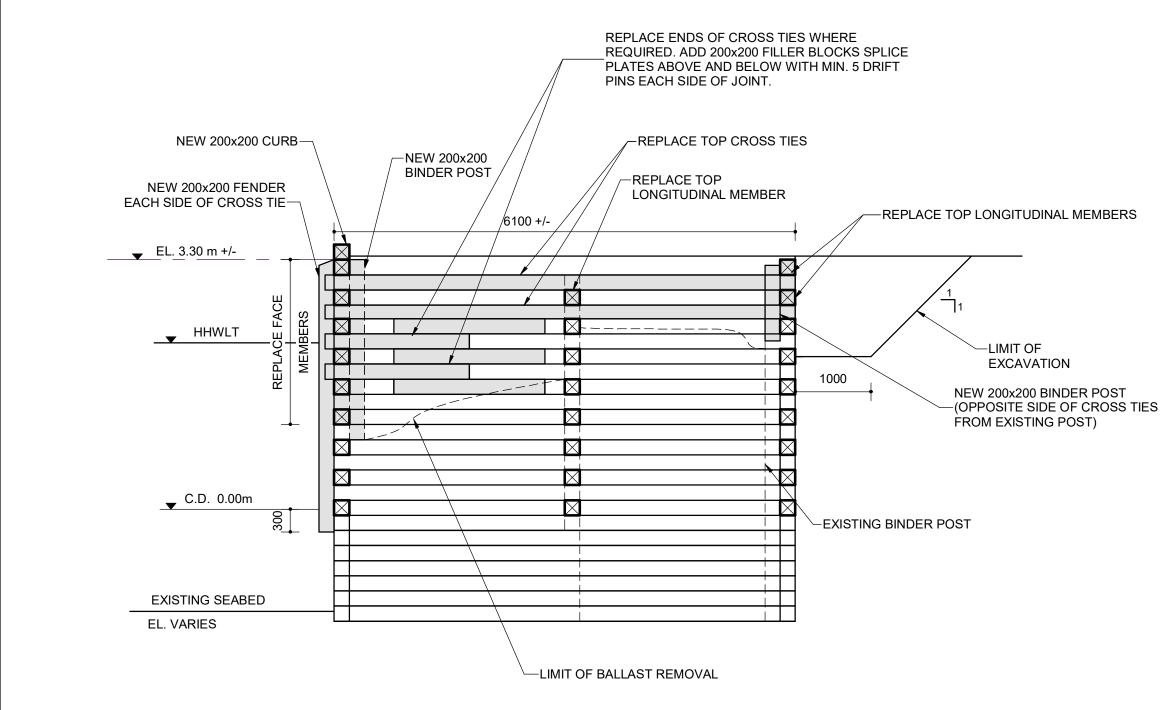
Three alternatives were presented for repair of the cribwork including partial replacement of cribwork similar to that previously completed on the south face; complete replacement with new timber cribs; and installation of new steel sheet piling around the site seaward of the existing crib faces. A summary of the estimated costs for each option are as follows:

Partial timber replacement:
 Complete replacement of timber cribs:
 New steel sheet piling bulkheads:
 \$858,000
 \$4,861,000
 \$3,025,000

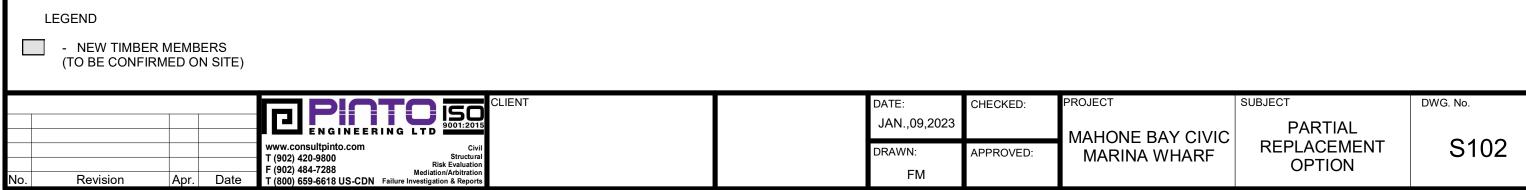
Although the partial replacement option is the least costly, it will have the shortest life span.

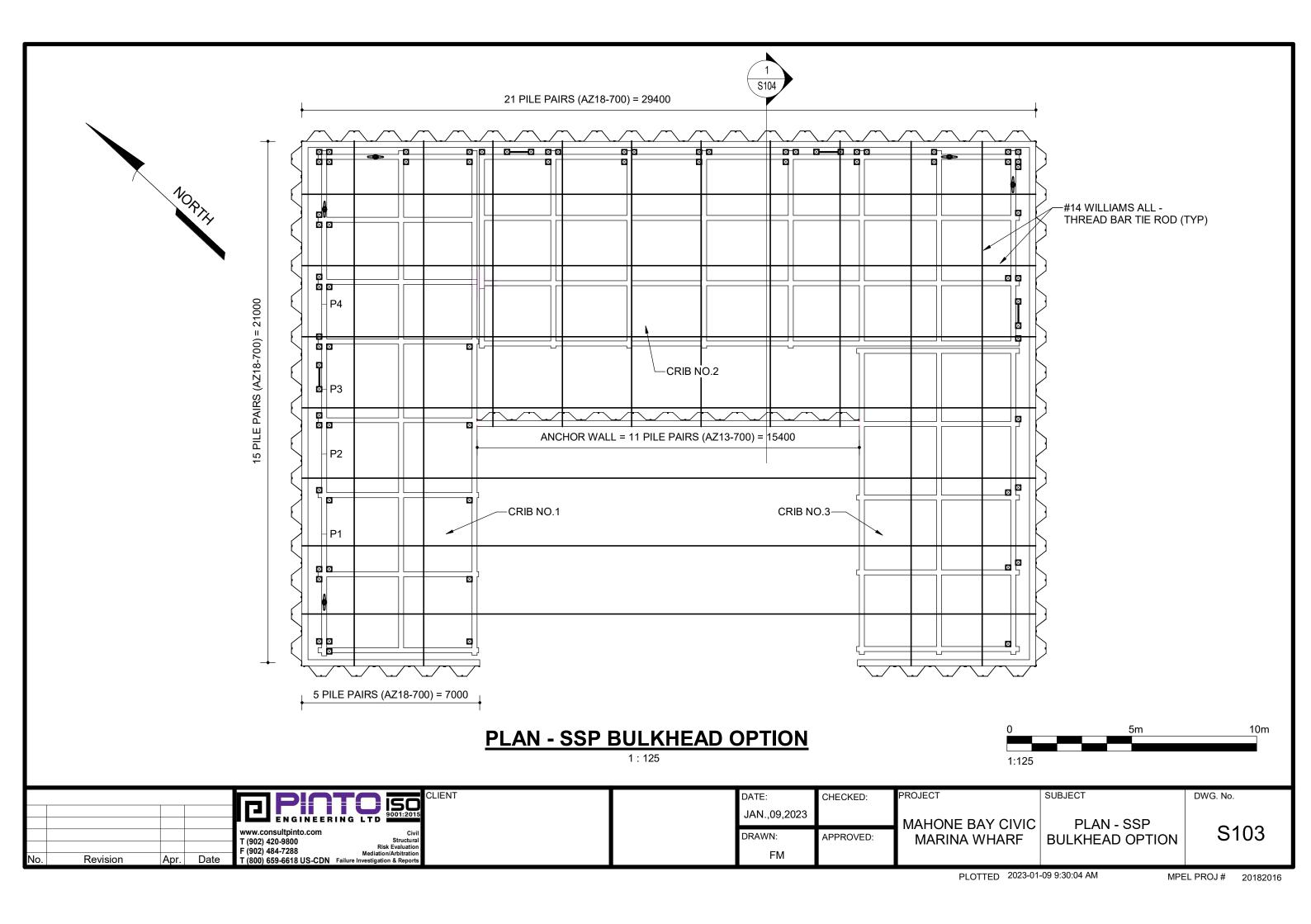


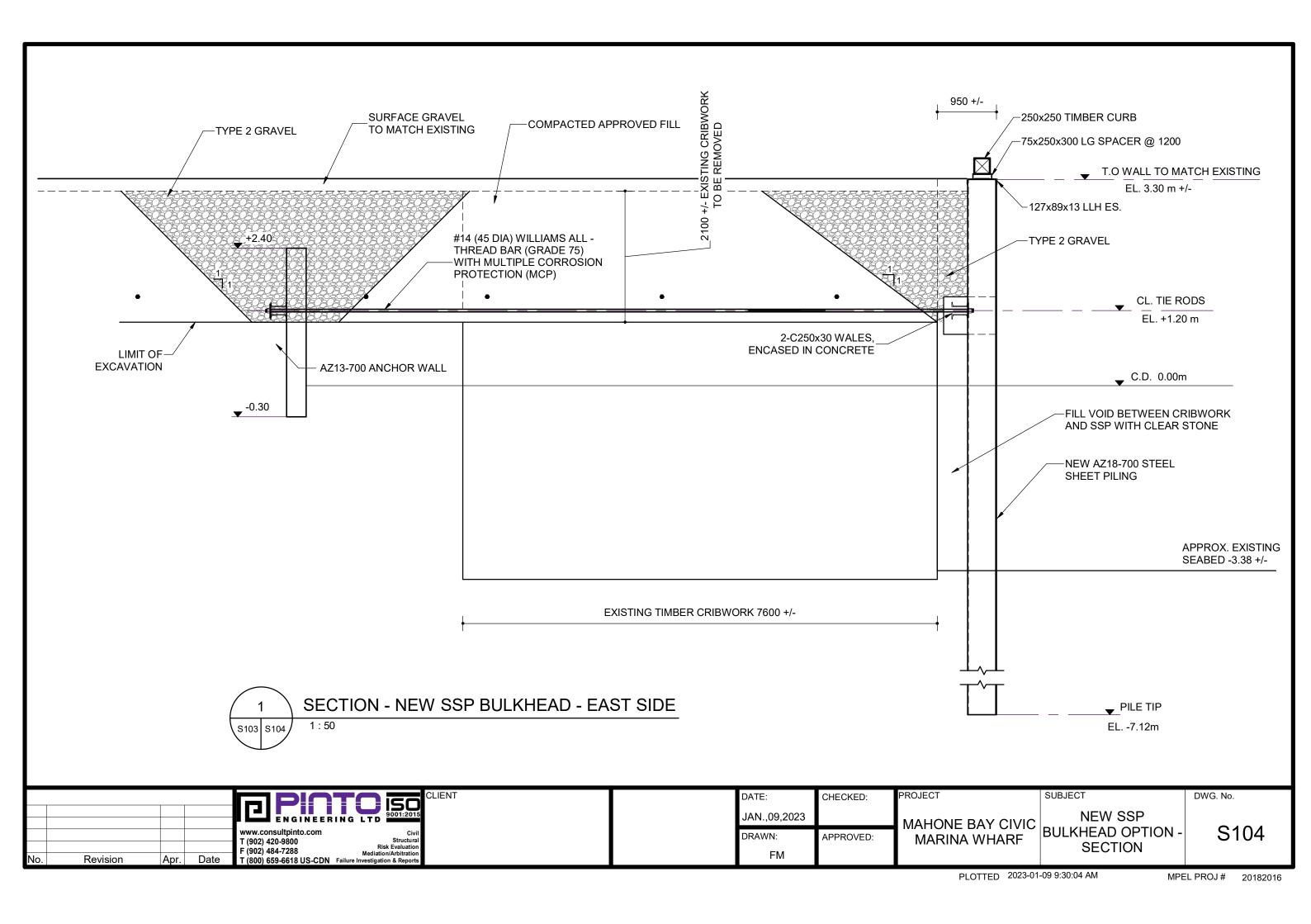


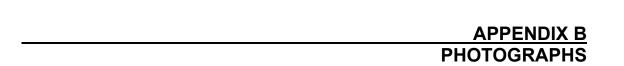


SECTION - PARTIAL REPLACEMENT OF CRIBWORK











1. Top of South side of wharf, where upper section of wharf face was previously replaced.



2. Top of East side of wharf. Note bowing outward.



3. Top of North side of wharf. Note string line used to take monthly measurements to monitor face displacements.



4. South face of wharf showing previously replaced face members and curb.



5. South face of wharf near the west end where less tiers of timber were replaced.



6. Severe splitting and deterioration at end of original cross ties on South face of wharf where face timbers were replaced.



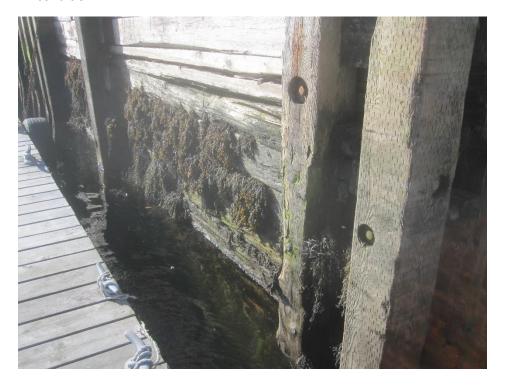
7. East face of wharf at South end. Main longitudinal member at seventh tier down is severely deteriorated.



8. East face of wharf. Note missing face of main longitudinal member to south of Cross Tie 5. Also note forward lean on wharf face.



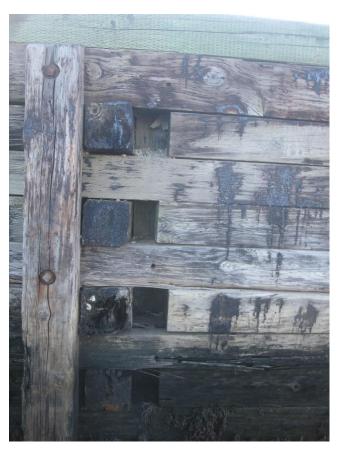
9. East face of wharf at Cross Tie 8. Note severe splitting and deterioration of main longitudinal member at seventh tier down. Tiers below also in bad condition.



10. East face at North end. Note severe splitting and deterioration of face timbers in the upper tidal zone



11. North face of wharf looking east. The fender timber is at Cross Tie 6.



12. North face at Cross Tie 6. Note binder post visible to right side of cross ties. There are no bolts from main longitudinal members to binder post. Also note deterioration of cross tie ends.



13. North face looking at Cross Tie location 5, that lines up with Test Pit 1.



14. North face between Cross Ties 5 and 6. Note severe deterioration of main longitudinal member at seventh tier from top. Members below are also badly deteriorated.



15. Back of timber crib at Test Pit No. 1.



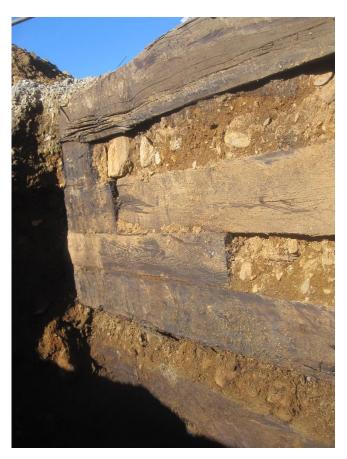
16. Back of crib at Test Pit No. 1 looking East.



17. Back of crib at Test Pit 1. End of top cross tie is badly deteriorated as well as top two longitudinal members.



18. Back of crib at Test Pit 1. End of second cross tie down. Some interior rot. Binder post is visible to the left behind the longitudinal members.



19. Back of Crib at Test Pit 1. View to left of cross ties in previous photograph.



20. Binder post on inside of backwall of crib at Test Pit 1. Note severe deterioration.



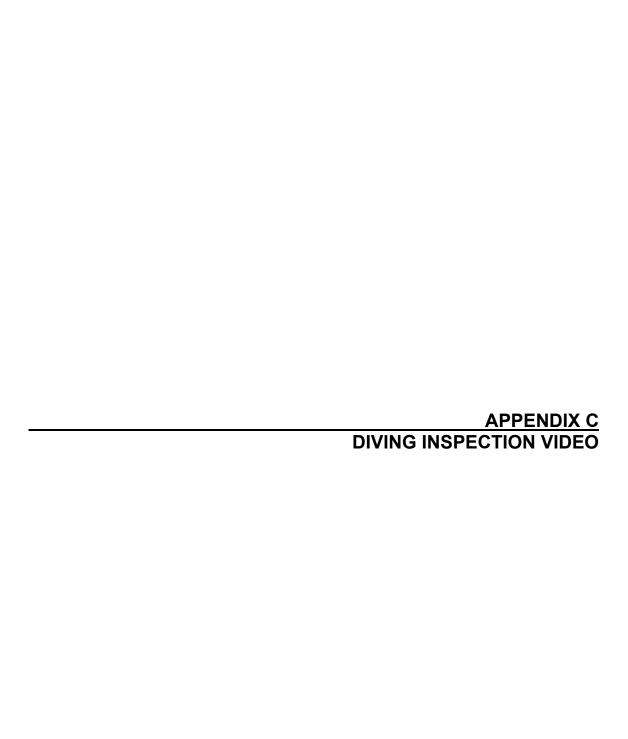
21. Center of crib north of Test Pit 1. Cross tie and intermediate longitudinal member fastened with one drift bolt. Note absence of binder post.



22. Front binder post at other end of cross ties exposed in Test Pit 1. Note severe deterioration and gap between post and front longitudinal member.



23. Test Pit 2 at intersection of backwalls of cribs on North and East faces of wharf.





Town of Mahone Bay

Staff Report RE: MBDFD Purchases February 7th, 2023

General Overview:

This staff report is intended to present Council with recommendations for the budgeted purchase of capital items for the Mahone Bay & District Fire Department.

Background:

The Town's 2022/23 annual budget, passed by Council July 28th, 2022, included allocations for a new pumper truck (\$1,000,000) and SCBA packs and bottles (\$40,000). At the regular Council meeting of December 13th, 2022 the Town Council approved an increase in the budget allocation for the pumper truck purchase to \$1,250,000.

Analysis:

Pumper Truck

The Request for Proposals for purchase of a new pumper truck closed on January 26th, following conforming proposals were received (all-in pricing):

	Price	Est. Net HST (4.286%)	TOTAL
HUB	\$1,122,521	\$48,111	\$1,170,632
Pierce	\$1,164,489	\$49,910	\$1,214,399
Fort Garry	\$1,249,970	\$53,574	\$1,303,544

On review of the proposals received Chief Adam Ekins and the MBDFD truck committee have recommended acceptance of the proposal from HUB. Though minor modifications are anticipated post award (typically within +/-2%), staff are confident the final net price of the truck will not exceed the allocation approved by Council.

Anticipated delivery of the truck is within 24 months (which was typical for all proposals).

SCBA Packs and Bottles

The purchase of SCBA packs and bottles from Cumings was approved by the CAO on the basis of time-sensitive pricing. The total net cost was \$70,080. Staff are seeking retroactive approval for exceeding \$40,000 allocation for this purchase in the annual budget.

Financial Analysis:

The 2022/23 annual budget anticipated that the purchase of the pumper truck would be funded by borrowing through the Municipal Finance Corporation, though this can be reassessed prior to debenture participation (which would not be possible until after delivery of the truck in any case). Short-term financing may need to be contemplated as costs are incurred.

The SCBA packs and bottles purchase will be financed from the Fire Equipment Reserve as per the annual budget.

Climate Analysis:

N/A

Strategic Plan:

N/A

Recommendation:

It is recommended,

THAT Council approve the acceptance of the HUB Fire Engines & Equipment Ltd. proposal for the supply of a new pumper truck for the Mahone Bay & District Fire Department, priced at \$1,170,1632 plus taxes; and,

THAT Council approve the purchase of SCBA packs and bottles from Cumings Fire & Safety Equipment Ltd. for \$67,200 plus taxes.

Attached for Council Review:

None

Respectfully Submitted,

Dylan Heide

Town of Mahone Bay CAO



Town of Mahone Bay Strategic Plan Review Public Engagement Plan

Presented to Council: February 7, 2023

GUIDING PRINCIPLES

Town of Mahone Bay public engagement is:

Meaningful;

o Informed;

o Timely;

Accessible;

Transparent;

o Appropriately scaled;

NATURE OF ENGAGEMENT

Matter for which public engagement is being sought:

Annual Review of the Town of Mahone Bay Strategic Plan 2021-2025

How input will be used:

Input from the public will be taken into consideration by Council when conducting their annual review of the Strategic Plan.

• Identified stakeholders:

Taxpayers of the Town of Mahone Bay, residents of the Town of Mahone Bay, utility customers, public members of Town committees, staff, and MBTCC

Impact of the matter on stakeholders:

The Strategic Plan review has the potential to impact tax rates, priority setting of capital projects, utility rates, by-law and policy direction, and the feeling of community direction and priority in Mahone Bay.

• Timeline for engagement / decision:

Engagement to take place starting February 10, 2023 and submissions to be received by February 21, 2023, a hearing-style session will be held on February 23, 2023 and a report to be presented to Council at the March 9, 2023 regular Council meeting; additional comments can still be submitted for the March 9, 2023 Council agenda as long as they are received by the March 6, 2023 submission deadline.

- What information is required to participate and where is it available: Information will be shared via the Town website, Facebook, a special notice, posters in Town, and the Community Notices from the Town, and Messages from Town Council message boards on the Town's mass notification system (CodeRED).
- Particular circumstances (including states of emergency and public health directives):

N/A

ENGAGEMENT TOOLS

Which pub

olic	engagement tools will be utilized:
*	Public hearing;
	Notes: _A <u>public hearing style session will be held for</u> members of the <u>public to submit their comments for Council consideration</u>
	In-person meetings, round-table discussions, town halls, open houses, or workshops;
	Notes:
	Digital engagement which may include webinars, message boards / discussion forums, and online polls or surveys;
*	Notes:online survey
*	Written engagement which may include written submissions, email feedback, mail-in surveys, polls and

Notes: _Written submissions will be received via email, mail, or <u>in-person</u>

Engagement by representation including the appointment of members of the public to Town committees;

Notes: _Notices will be forwarded to public members of Town committees



Reproveding information through the media, websites, social media, and other channels:

Notes: _Information on the Strategic Plan, and the ways in which to participate in the public engagement will be shared via the Town's website and Facebook, and the Town's mass notification system (CodeRED); a notice of the public hearing style a session will be run in the local paper_____

]	Other:			
	Notes:			

REQUIRED RESOURCES

 Communication plan to inform the public about the public engagement plan and opportunities to provide input:

The Strategic Plan and the Strategic Plan Reporting will be posted on the Town website, with social media links to the location on the website, and information shared will advise that printed copies are available by request or at Town Hall.

- Required resources and costs:
- Use of the Town's existing information-sharing media;
- the Town's online survey tool:
- the Town's mass communication network;
- the Town's online meeting platform;
- a direct mail notice (aprox \$150); and
- an estimated 20 hours of staff time.



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Community Solar Garden Monthly Update

December 2022



Table of Contents

- Project Information
- Summary of Last Month's Activities
- Overview
- Construction Progress
- Health, Safety and Environment
- Milestones Summary
- Upcoming Activities



Project Information

Project Name	Mahone Bay Community Solar Gardens			
Owner Name	Town of Mahone Bay			
Project Address	918 Main Street			
Site Area (Acres)	~6 Acres			
System Size (AC / DC)	1.500MWac / 1.816MWdc			
Racking	PHLEGON® Fixed – 2P Continuous (GP Joule Product)			
Modules	LG440N2T-E6 (440Wp Bifacial)			
Inverters/Transformers	Sunny Highpower PEAK3 125-US			
Budget	On budget with contingency			



Summary of Last Month's Activities



Continued installing modules



Implemented additional water mitigation measures



ZON (owners engineer) onsite] performing Site Inspection



QA/QC of racking, carriers, channels and modules



Council Site Visit

Overview

Module Installation

GP Joule has installed most of the modules, as shown in the below drawing. Panels highlighted blue have been installed, panels highlighted in yellow require additional manpower to install safely and panel highlighted green will be installed once trenching is completed.

Z-carriers, C-channels & Racking QA/QC

All the z-carriers, c-channels and racking in the blue and green sections highlighted below have been installed and are in the process of being inspected. Those sections in yellow will be installed once trenching is completed.

Owners Engineer ZON Site Visit

ZON personnel arrived onsite December 8 to inspect the site. Due to material delays the Golden Tables were not completed. ZON will return to the Mahone Bay site again once the Antigonish site is ready for inspection.

Water Mitigation Measures

The Mahone Bay site has been experiencing above-normal amounts of rainfall, prompting GP Joule to install additional water mitigation measures to ensure the surrounding properties don't sustain property damage and no silt leaves the site. Stormwater management will continue to be improved as the need arise and where weaknesses are identified.





Construction Progress

Scope of Work	Total QTY to be Installed	Installed This Week	Installed To Date	Performed %
Site Trailer and Facilities	1		1	100%
Site Grading (Cut & Fill)	1		1.0	100%
Erosion Control	1		1.0	100%
Security Fence Installation	1		1.00	100%
Pile Installation	297		297	100%
Racking	258		221	65%
Modules with QA/QC	4,128	176.00	2,736.00	66%
PV Wire Pulling (per string)	10,668			0%
DC Combiner Mechanical Installation & Termination	10			0%
Underground Trench (DC)	491			0%
Pad for Inverter and AC Panel Board	1		0.4	40%
Transformer Vault and Pad	1			0%
Inverter Mechanical Installation & Termination	10			0%
Transformer Installation & Termination	1			0%
AC Panel board Installation & Termination	1			0%
SCADA and Weather Station Installation	1			0%
Substantial Completion	1			0%
Performance Test 1	1			0%
Performance Test 2	1			0%
Demobilization/Site Clean-up / Punch List				0%

Health, Safety and Environment

Safety

Days without Injury	Near Misses	First Aids	Recordable
123	0	0	0

Health & Environmental

Event	Date	Mitigation
0	N/A	N/A



Milestones Summary

	Contract Baseline	Scheduled App'd	Actual
LNTP Agreement	20-01-2022	20-01-2022	20-01-2022
EPC Agreement	18-07-2022	18-07-2022	18-07-2022
LNTP Milestone 1	23-03-2022	23-03-2022	23-03-2022
LNTP Milestone 2	07-04-2022	07-04-2022	07-04-2022
LNTP Milestone 3	04-07-2022	04-07-2022	04-07-2022
Mobilization	26-07-2022	26-07-2022	26-07-2022
Modules Delivery (Owner Supplied)	21-09-2022	16-09-2022	16-09-2022
Inverters Delivery (Owner Supplied)	16-09-2022	16-09-2022	16-09-2022
Foundation Delivery	14-09-2022	14-09-2022	21-09-2022
Racking Delivery	30-09-2022	30-09-2022	14-11-2022
Transformer Delivery	05-04-2023	05-04-2023	
AC Panel Board Delivery	09-05-2023	09-05-2023	
Substantial Performance	25-05-2023	25-05-2023	
Final Completion	22-06-2023	22-06-2023	



Upcoming Activities

- Continued work on Stormwater Management System.
- A sample solar module table will be constructed.
 - Electrical inspections will occur to review the wiring and overall set-up of the sample module table
- Trenching for underground conduit.
- Remaining modules will be installed.
- Inverter pad will be completed.
- Begin electrical scope of work.





Town of Mahone Bay AREA Staff Report Re: Community Solar Garden Stormwater Update February 1st, 2023

Overview:

The stormwater update for the community solar garden project report will provide Council with an update regarding how the stormwater management system has performed and what additional measures that AREA and its Contractor will add.

Background:

AREA, in consultation with Tulloch Engineering Inc., developed the Community Solar Municipal Stormwater Management Plan for the Town of Mahone Bay ("the Town") to address stormwater-related impacts on the Community Solar Gardens site, located at Civic 918 Main Street on PID 60371390 in Mahone Bay, Nova Scotia. This Plan was received and approved by the Town Council at their regular meeting on July 12th, 2022.

The plan addresses stormwater flow, intending to minimize the adverse impact of stormwater runoff and water quantity and the loss of groundwater recharge that provides baseflow in receiving water bodies. The plan describes long-term operation and maintenance measures for existing and future stormwater facilities. It should also be noted that the Community Solar Municipal Stormwater Management Plan will continue to evolve as conditions on the site change as a result of climate change.

Construction activities and site conditions:

Over the past seven months, construction activities on the site included site grading, installation of stormwater management infrastructure, site security and the installation of solar panels. These activities have altered the site conditions, which AREA and our Civil Engineers expected and incorporated into the design. Unfortunately, what was not anticipated was the adverse weather conditions. The data below illustrates the weather conditions we experienced and their effect on the site. Throughout these events, AREA and our Contractor GP Joule have worked with our abutting neighbour, Mr. Sampson (906 Main St.), to divert as much stormwater as possible from their property and buildings.

Historical Data:

The weather we are encountering this winter is significantly different from previous years and our Construction Team (GP Joule) has prepared as well as they could, for the extraordinary weather events this winter.

Below we will compare the weather events experienced this year to previous years. We will compare the warmer-than-usual temperatures experienced this January and detail how this change has affected the site. We will also present comparisons of the precipitation and rainfall amounts experienced this year with previous years and, illustrate the above-normal rainfalls that our team could not have anticipated.

Warmer Temperatures:

The weather we have experienced this year is not consistent with previous years as shown in Figure 1. This January, twenty (20) out of the twenty-nine (29) days documented, have been above zero (0) degrees. The previous five (5) years have seen an average of 10 days of weather above 0 degrees (table 1). As a result of the warm temperatures, the ground has only been frozen for a handful of days this last month (table 2). Had the ground been able to freeze any rainfall encountered would have run off to the harbour, free of sediment.



Town of Mahone Bay AREA Staff Report

Re: Community Solar Garden Stormwater Update

February 1st, 2023

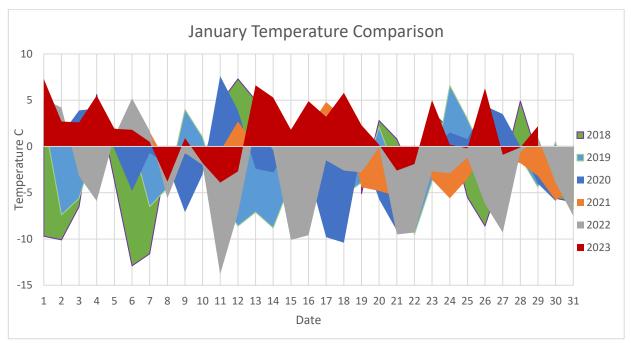


Figure 1: Weather Comparisons for the Month of January

Table 1 Comparison of days above the specified temperature

Total Number of Days Above 0 Deg.			Fotal Number of E Above 2 Deg.	Days	Total Number of Days Above 5 Deg.	
2018	9		2018	7	2018	2
2019	10		2019	5	2019	1
2020	10		2020	7	2020	1
2021	13		2021	4	2021	0
2022	7		2022	4	2022	2
2023	20		2023	13	2023	6

Table 2 Comparison of days below the specified temperature

Total Number of	Days	Total Number	Total Number of Days		Total Number of Days	
Below 0 Deg.		Below -5 Deg.			Below -10 Deg.	
2018	21	2018	10		2018	3
2019	21	2019	11		2019	0
2020	19	2020	7		2020	1
2021	18	2021	. 3		2021	0
2022	24	2022	11		2022	2
2023	9	2023	0		2023	0



Town of Mahone Bay AREA Staff Report

Re: Community Solar Garden Stormwater Update

February 1st, 2023

Increased Rainfall:

Accompanied by the warmer-than-usual temperatures in Nova Scotia this year are the significant rainfall events. Typically, in January Nova Scotia expects snow and freezing rain, what is not typical is multiple events of rainfall with the significant amounts we received this year (Figure 2) and the low quantities of snow. Not only did we receive almost 60% (table 3) more rain in January compared to January 2022, but these events happened back-to-back. To highlight a few, Nova Scotia received over 89mm of rainfall over the weekend of January 13th. Then on January 23 and January 26 we received over 40mm of rainfall each day.

Figure 2: Rainfall Comparisons for the Month of January.

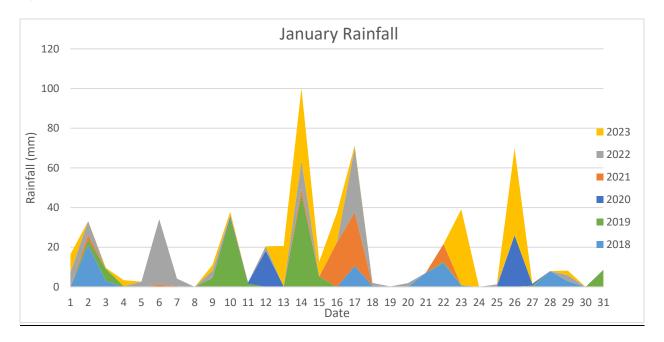


Table 3 Rainfall comparison

Year	Total (mm)	Rainfall	Total (cm)	Snowfall	Total (mm)	Precipitation	Days with Rainfall Greater than 20mm
2018	65.9		29.4		89.9		1
2019	111.4		32.7		138.1		2
2020	47.3		77.7		105.4		1
2021	65.2		34.9		96.1		2
2022	114.4		48.4		161		2
2023	182.7		23.2		197		4



Town of Mahone Bay AREA Staff Report Re: Community Solar Garden Stormwater Update February 1st, 2023

Continued monitoring and adjustment:

AREA and our Contractor GP Joule continue to monitor all stormwater management infrastructure and prepare for each known weather event. Please see Appendix A for a list of activities pre- and post-weather events. AREA staff and GP Joule crew have worked with Mr. Sampson over the past seven months to address runoff from the solar site and minimize the impact it has on the abutting property.

Recommendations:

AREA staff recommend that Council direct staff and AREA staff to continue the dialogue with Mr. Sampson and work with him to best manage site runoff.

Attached for Council Review:

Appendix A Continued Stormwater Management

Submitted by:

Lenta Wright

Project Development & Operations Manager



Town of Mahone Bay

Staff Report RE: Winter 2023 Transportation Update

February 7th, 2023

General Overview:

This staff report is intended to present Council with updates on the implementation of transportation projects and initiatives previously approved by Council.

Background:

At the regular Council meeting of September 29th, 2022 Council received a staff report entitled Fall 2022 Transportation Update. This report followed on a prior report provided to Council October 28th, 2021. The September 29th, 2022 report is attached to this report as Appendix A.

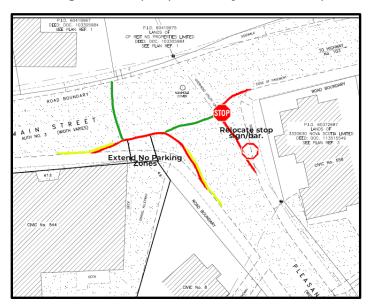
Analysis:

Since the tabling of the prior report in September:

- New 40 km/h and 40 km/h ahead signs have been erected in accordance with Council's reduction in speed limits on all Town roads other than Main St. and Edgewater St. (per permission received from the Province).
- Improvements have been completed to the trail crossing on Main St. at Long Hill Rd. in accordance with Council's direction Oct 27th, 2022.
 Additional signs were installed reminding trail users to look both ways and a second advanced flashing indicator was installed for motorists approaching from the direction of downtown.



- on Pleasant St. and Fauxburg Rd.. The Town's equipment for monitoring vehicle speeds and traffic counts installed on Pleasant St. before and after the installation of speed cushions shows a reduction in average speed from 38 km/h to 27 km/h. Some quality issues have been noted with the speed cushions particularly inconsistency in their height which will be addressed by the contractor when asphalt paving resumes in 2023. Some reports have been received concerning additional traffic on Pine Grove St. as motorists detour around the traffic calming; these issues will likely subside over time however in the immediate term speed/traffic monitoring equipment will be relocated to Pine Grove St. (as discussed at the February 2nd, 2023 Police Advisory Board meeting).
- Staff filed the final report for the Town's 2021-22 Connect2 Program supported project; additional info under Financial Analysis below.
- A survey of the intersection of Pleasant St. and Main St. has been completed (attached as Appendix B). Staff recommend against proceeding with a 3-way stop configuration as directed by Council due to complications with access to commercial parking (particularly the Independent Store lot) which would be expected to result. Staff instead recommend teeing up the intersection with new concrete curbs, intended to improve visibility for motorists and enhance pedestrian safety. The reconfiguration proposed by staff is depicted here:



Proposed new curbs are shown in red, existing crosswalks in green. Staff recommend relocation of Stop on Pleasant St. and extension of no parking zones (yellow) as depicted.

- The engineering review of the intersection of Edgewater St. and Main St. is being carried out by WSP with an initial "existing conditions and concepts" report to Council anticipated in March 2023.
- At the regular meeting of Council on November 8th, 2022 Council directed staff to consider the potential for a Truth & Reconciliation crosswalk in front St. John's Lutheran. Staff have no safety concerns and recommend including this crossing in the 2023 painting tender, pending consultations with the Acadia First Nation as directed.



The annual painting tender also provides an opportunity to re-assess the location of accessible parking spaces and no parking zones and staff recommend a review of both prior to the issuance of the tender.

In addition to the above it should be noted that:

- Staff have applied to the Federal Active Transportation Fund to support the proposed multi-use trail on Edgewater St. and continue to pursue additional funding opportunities in this regard as well.
- Staff are still waiting on a response from the Province to repeated requests for reduction in the speed limit approaching Edgewater St. from Hwy 3.
- Staff remain engaged in discussion with representatives of NSLC concerning a possible Kinburn St. to Main St. connection.

Financial Analysis:

Connect2 Project

The Town's 2021-22 Connect2 Program supported project (All-Ages Cycling Route Infrastructure Improvement Project) was initially anticipated to be \$96,348 (supported by \$50,000 grant) and would have included the proposed Kinburn St. – Main St. (NSLC) connection. The connection couldn't be completed in time – dialogue with NSLC continues – but the project was able to accommodate all traffic calming (Kinburn, Clairmont, Pleasant and Fauxburg) as well as signage improvements for all trail crossings and extensive improvements to the Main St. crossing at Long Hill Rd.. The final cost of these improvements was \$69,957.10 including taxes, supported by the \$50,000 Connect2 grant (the grant amount didn't change as the program covers costs up to 75% of total project costs), for a total Town cost of \$19,957.10.

Edgewater/Main Intersection Review

The 2022/23 annual budget included an allocation of \$30,000 for the engineering review of the intersection od Edgewater St. and Main St.. WSP was selected on the basis of the proposal they submitted to the Town's Request for Proposals process; the total cost was \$29,241.79 (\$28,040+Net HST). The proposal also included a price of \$15,740+taxes for additional predesign services if Council selects a reconfiguration option to proceed to predesign (which would be necessary prior to tendering for construction).

Climate Analysis:

Transportation improvements supporting active transportation align with Council's objectives under the Community GHG Reduction Action Plan.

Strategic Plan:

1.3. Improve Accessibility of Public Infrastructure

· Strategically improve transportation infrastructure to support healthy living

Recommendation:

It is recommended,

THAT Council direct staff to proceed with the recommended Tee-up of the Pleasant St. and Main St. intersection (rather than the 3-way stop as previously directed); and, THAT Council direct staff to carry out an assessment of the location of accessible parking spaces and no parking zones and report to Council in this regard prior to the issuance of the 2023 painting tender.

Attached for Council Review:

- Fall 2022 Transportation Update Report
- Pleasant/Main Intersection Survey

Respectfully Submitted,

Dylan Heide

Town of Mahone Bay CAO

Appendix



Town of Mahone Bay

Staff Report RE: Fall 2022 Transportation Update September 29th, 2022

General Overview:

This staff report is intended to present Council with updates on the implementation of transportation projects and initiatives previously approved by Council.

Background:

The last staff report comprehensively updating Council regarding transportation initiatives was provided to the regular Council meeting on October 28th, 2021; regular updates on highlights are provided to each regular meeting via the Report to Council document.

Since the tabling of the prior report, Council has:

- Approved speed humps on Clairmont St. and Kinburn St., which have been installed;
- Made several requests to the Province for speed limit reductions;
- Approved Town staff working with representatives of the Nova Scotia Liquor Commission (NSLC) on the development of a concept for a pedestrian and cycle "cut through" from Kinburn St. To Main St.;
- Added a 3-way stop at the intersection of Pleasant St. and Main St. to the ongoing transportation infrastructure improvement project with staff to present designs; and,
- Approved a budget for an engineering review of options to improve safety at the intersection of Edgewater St. and Main St..

Staff have also completed:

- Improvement/installation of crossings at Kedy's Landing, St. James Anglican Church, St. John's Lutheran Church (pride crossing), Mahone Bay Medical Clinic, and Long Hill Trail crossing;
- Improvement of trail crossings signage throughout town; and,
- Installation of permanent speed signs on the Edgewater St. and Main St. (to/from Blockhouse) entrances with the remaining mobile speed sign and tube counters being deployed in various locations per the previously approved schedule.

Additional requests / concerns from residents have also been received, including the correspondence from Deryk McGrath, a resident of Pleasant Street, which appeared on Council's Sept 13, 2022 meeting agenda.

Analysis:

Staff continue to advance Council's strategic objectives with respect to transportation and request direction in the following areas:

Speed Limits

Two requests for alteration of speed limits have been filed with the appropriate Provincial authorities:

- Permission for reduction of speed limits within the boundaries of the Town of Mahone Bay to 40 km/h; and,
- Relocation of the 50 km/h zone on Provincial Highway 3 as it approaches the Town boundary on Edgewater St. to further up the hill, allowing additional time for motorists to reduce their speeds and prepare to stop at the new Kedy's Landing pedestrian crossing.

Approval has now been received from the Provincial Traffic Authority for speed limit reductions to 40 km/h within Town boundaries, with the exception of Main Street and Edgewater Street which are considered arterial/collector roads by the Province and therefore have a speed limit of 50 km/h, and established school zones where the speed limit drops to 25 km/h when children are present.

Complaints continue to be received concerning speeding on local roads within the Town boundaries – including recently a number of complaints from residents of Long Hill Road – and as such staff recommend Council setting speed limits at 40 km/h where permitted to do so by the Province. New signage will be installed where motorists turn off Main St. and Edgewater St. onto local streets where speeds could exceed 40 km/h (see attached map).

No response has yet been received to the request for relocation of the 50 km/h zone on Provincial Highway 3.

Pleasant / Fauxburg Traffic Calming

Concerns have been raised regarding vehicle speeds on Pleasant St. and Fauxburg Road (including from Deryk McGrath as noted above). Pleasant St. and Fauxburg Road have also previously been identified as important connecting streets for cyclists as Pleasant St. runs through one of the town's

larger residential areas connecting to the downtown core, and Fauxburg Road connects to the Bay-to-Bay Trail near the Town boundary.

In many ways Pleasant St. and Fauxburg Road share characteristics with Clairmont Street and Kinburn St. on the other side of town where speeding concerns led Council to approve the installation of speed humps as a traffic calming measure. Staff recommend speed humps for Pleasant St. and Fauxburg Road as a traffic calming measure (Deryk McGrath also proposed this solution for Pleasant St.).

Speed humps can be effective in reducing traffic speeds on local streets. On Clairmont/Kinburn for example average speeds prior to the installation of speed humps were 46-49 km/h while this summer average speeds had reduced to 33 km/h according to the Town's speed monitoring signage. Speeds on Pleasant St. (from Fairmont St. to Fauxburg Road) averaged 36 km/h in August and September of 2022, however there were 389 violations of the posted 50 km/h captured by the Town's equipment during this time.

In consideration of staff's recommendation in this regard it should be noted that staff have been in communication with the current Fire Chief Adam Ekins regarding the use of speed humps by the Town and he has requested the Town consider the use of speed cushions in this case. Speed cushions are similar to speed humps but separated in the middle to allow easier passage of emergency vehicles. Though the Town previously consulted with the fire department prior to the installation of speed humps on Clairmont St. and Kinburn St. – and speed cushions were not seen as necessary – the proposed installation on Pleasant St. and Fauxburg Road would present an opportunity to trial this alternative design.







Speed Cushions

See the attached map for reference on proposed speed hump installations.

Cycling / Trail Infrastructure

As noted above, the Town has made numerous improvements to transportation infrastructure over the past year. In part these improvements have been supported by funding obtained from the Provincial Connect2 Program which is intended to support cycle route connectivity and safer cycling opportunities in our community.

In this regard the Town had received a prior recommendation from Bicycle NS staff during their work on the Blue Route Community Hubs project in Mahone Bay – which was referenced in the Oct 28, 2021 report to Council concerning transportation projects – to provide a wayfinding kiosk and bike racks be provided at the Western end of public parking lot on Clairmont Street, to support access to the downtown by cyclists. Staff recommend proceeding with this suggestion from Bicycle NS, utilizing approved Connect2 funding.

On a related note, a request has recently been received from one of the local trail associations for permission to install signage identifying the trail-head at Hawthorn Road (Bay-to-Bay Trail), served by the public parking lot adjacent to the tennis court. The local trail associations have previously been given permission to install such signage and staff recommend granting permission in this case as well.

In addition to the above it should be noted that:

- Design work on the proposed 3-stop for the intersection of Main St. and Pleasant St. is now underway;
- An RFP is under development for engineering review of the intersection of Edgewater St. and Main St.; and,
- Staff are engaged in discussion with representatives of NSLC.

Financial Analysis:

Funding allocation for all transportation initiatives noted herein is already included in the 2022-23 budget approved by Council on July 28, 2022. Many of these initiatives are supported by previously approved funding from the Provincial Connect2 Program.

Climate Analysis:

Transportation improvements supporting active transportation align with Council's objectives under the Community GHG Reduction Action Plan.

Strategic Plan:

1.3. Improve Accessibility of Public Infrastructure

· Strategically improve transportation infrastructure to support healthy living

Recommendation:

It is recommended.

THAT Council hereby set speed limits within the boundaries of the Town of Mahone Bay at 40 km/h, with the exception of Main Street and Edgewater Street which are considered arterial/collector roads by the Province and therefore have a speed limit of 50 km/h, and established school zones where the speed limit drops to 25 km/h when children are present; and,

THAT Council approve the installation of speed humps/cushions on Pleasant Street from Fairmont to Fauxburg Road, as well as on Fauxburg Road, with a letter to be distributed to residents of Pleasant and Fauxburg informing them of the Town's intention in this regard and providing contact information for the Town's CAO/Traffic Authority; and,

THAT Council approve the installation of a wayfinding kiosk and bike racks at the Western end of public parking lot on Clairmont Street, supported by confirmed funding from the Provincial Connect2 program; and,

THAT Council convey approval for the installation of new trail-head signage by local trail associations, where applicable.

Attached for Council Review:

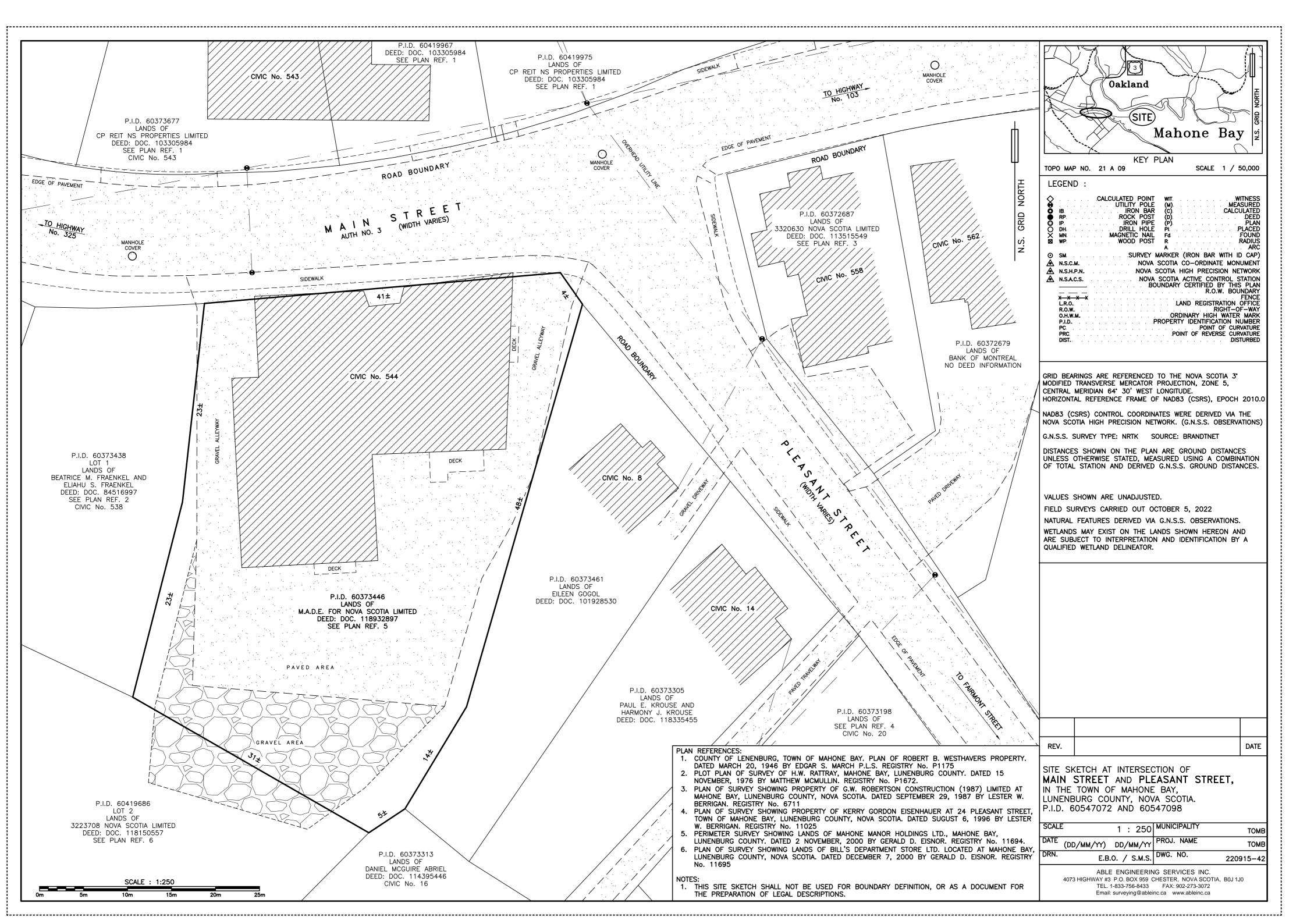
• Map showing proposed speed limit reductions (signage) and potential speed hump installations on Pleasant / Fauxburg

Respectfully Submitted,

Dylan Heide

Town of Mahone Bay CAO







Town of Mahone Bay

Staff Report RE: Accessibility Audits February 7th, 2023

General Overview:

This staff report is intended to present Council with a recommendation concerning the conducting of accessibility audits of Town facilities.

Background:

The 2022/23 annual budget approved by Council on July 28th, 2022 contained an allocation of \$25,000 for accessibility audits of Town facilities. Completion of accessibility audits will be a required action in the Town's Accessibility Action Plan (plans which each of the five municipal units in the county are required to complete in accordance with the <u>Lunenburg County Accessibility Plan</u> approved by the five councils).

It is anticipated that the draft Accessibility Action Plan for Mahone Bay (formerly Accessibility Operational Plan) – which has been developed by the joint accessibility coordinator and Town staff – will be presented to Council's February 23rd meeting by Accessibility Coordinator Ellen Johnson.

Analysis:

It is very likely that the cost to carry out the required accessibility audits of Town facilities will exceed the budgeted \$25,000. An opportunity for external funding support has been identified through the Provincial Community ACCESS-Ability Program. The Town has accessed this fund for capital improvements in the past – including for the Sports Field project with Mahone Bay United which took place in 2022 – but accessibility audits are also an eligible cost.

In line with the draft Accessibility Action Plan which will soon be presented to Council, staff recommend applying for Community ACCESS-Ability Program funding to support to conduct of accessibility audits of outdoor / recreational facilities. Staff have prepared a brief summary of the facilities recommended for inclusion in Community ACCESS-Ability funded audits in 2023 which is attached as an appendix to this report.

Applications to the 2023-24 ACCESS-Ability program will be accepted until February 14th, 2023, therefore staff recommend applying for this funding now in anticipation of the presentation of the draft Accessibility Action Plan later this month.

Financial Analysis:

Council's budgeted \$25,000 can be leveraged with Community ACCESS-Ability Program funding up to \$50,000. Staff are currently awaiting costs from contractors to support the application but are confident the total cost of the planned audits will be less than \$75,000, therefore no additional budget allocation from Council should be required.

Climate Analysis:

N/A

Strategic Plan:

1.3. Improve Accessibility of Public Infrastructure

• Develop and implement Accessibility Operational Plan (as per approved Lunenburg County Accessibility Plan)

Recommendation:

It is recommended,

THAT Council direct staff to apply to the Community ACCESS-Ability Program for funding to support the conduct of accessibility audits of Town facilities.

Attached for Council Review:

• Summary of facilities recommended for accessibility audit

Respectfully Submitted,

Dylan Heide

Town of Mahone Bay CAO

Appendix

Bandstand - 92' x 42' = 3,864 sq/ft



Sports field $-396' \times 212' = 83,952 \text{ sq/ft}$





Aquatic Gardens – 140' x 380' = 53,200 sq/ft



Jubilee Park Playground – 385' x 111' = 42,735 sq/ft



The remaining "wilderness" section of Jubilee Park including walking / cycling trails is ~12 Acres.

Tennis Courts – 170' x 220' = 37,400 sq/ft



Swimming Pool – $138' \times 138' = 19,044 \text{ sq/ft}$



Ball Field and Washroom – 384' \times 386' = 148,227 sq/ft

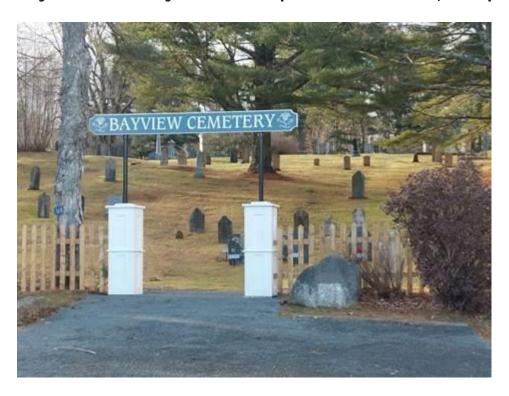




Park Cemetery – 876' x 112' plus 220' x 682' = 24,8152 sq/ft



Bayview Cemetery – 231' x 403' plus 98' x 226' = 115,241 sq/ft





Lunenburg County Accessibility Advisory Committee (LCAAC)

January 18, 2023

Municipal Councils of:
Town of Mahone Bay
Town of Bridgewater
Town of Lunenburg
Municipality of the District of Chester
Municipality of the District of Lunenburg

RE: Appointment of Lunenburg County Accessibility Advisory Committee Community Member

Dear Members of Council,

The Lunenburg County Accessibility Advisory Committee (LCAAC) currently has one vacancy for a community member as one of the appointees has recently passed away.

On January 18, 2023, the Lunenburg County Accessibility Nominating Committee comprised of the Mayors and Wardens of the five Lunenburg County municipalities (or their designates) reviewed the remaining applications received from the previous call for volunteers and makes the following recommendation to the five Municipal Councils in Lunenburg County:

To appoint Jeane Fay to the Lunenburg County Accessibility Advisory Committee for a term of three years.

With regards

Ellen Johnson, MSc(OT), OT Reg(NS) Accessibility Coordinator

ejohnson@chester.ca

902-277-0456

Councillor Feeney Motion for Consideration February 7, 2023

THAT Council direct staff to purchase a national flag of Kenya to be used at future events which will be held in Mahone Bay to welcome the international healthcare workers who will be joining the Mahone Nursing home staff.



A meeting of the Policy & Strategy Committee for the Town of Mahone Bay was held on Monday, January 30, 2023 at 7:00 p.m. in Council Chambers.

Present:

Mayor David Devenne
Councillor Penny Carver
Councillor Joseph Feeney
Councillor Suzanne Lohnes-Croft
Councillor Richard Nowe
Councillor Kelly Wilson
CAO, Dylan Heide
Town Clerk & Deputy CAO, Maureen Hughes

Absent: Deputy Mayor Francis Kangata (regrets)

Gallery:

Let us begin by acknowledging that we are gathered today in Mi'kma'ki. The ancestral, present and future territory of the Mi'kmaw people. Today, we gather with the intent followed by the living Peace and Friendship Treaties - with respect, cooperation and coexistence.

1. Approval of Agenda

A motion by Councillor Feeney, seconded by Councillor Carver, "THAT the agenda be approved as presented."

Motion carried.

2. Minutes

A motion by Councillor Carver, seconded by Councillor Wilson, "THAT the minutes of the November 28, 2022 meeting be approved as presented."

Motion carried.

3. Committee Policy

3.1 Committee Policy

A motion by Councillor Wilson, seconded by Councillor Feeney, "THAT this committee remove the Public Input Session from the draft amended Council Policy."

Councillor Carver no Councillor Feeney yes
Councillor Lohnes-Croft no Councillor Nowe yes

Motion carried.

4. Kindness Meters

The committee discussed the location of kindness meters on Town property if future questions were to come forward.

A motion by Councillor Carver, seconded by Councillor Feeney, "THAT this committee recommend that Council direct staff to complete an inventory of kindness meters on Town property."

Motion carried.

5. Next meeting

5.1 Date and Time

The next meeting of the Policy and Strategy Committee will be held at 7pm on Monday, February 27, 2023 at 7pm.

4.2 Items to be added to items for upcoming agendas

The role of the Police Advisory Board was referred to the committee due to phrasing in a letter received from the Department of Justice but the concern has since been addressed by staff and the matter will not be added to a future agenda of this committee.

4.3 Agenda for next meeting

A motion by Councillor Wilson, seconded by Councillor Carver, "THAT the committee recommend that Council set the agenda for the February 27, 2023 meeting of the Policy and Strategy Committee to include the Employee Conduct Policy and the Respectful Workplace Policy."

With no further agenda items, the meeting adjourned at 9:18pm.

TOWN OF MAHONE BAY

TOWN OF MAHONE BAY

Chair, Mayor David Devenne

Clerk, Maureen Hughes