



Item 7b.

Sunfish Lake Engineer's Report for May 1, 2018

By: Jeff Sandberg, PE, City Engineer

Date: April 27, 2018

1. Engineering Activities Undertaken in the Month of April.

The following Engineer's Report reflects the activities undertaken this past month, along with the anticipated engineering activity for the month of May.

- A. **Charlton Road Improvements Update** – Don Sterna has been working with residents and council on securing easement agreements on Charlton Road. Mr. Sterna will request that the Feasibility study be accepted and the project ordered at the May City Council meeting.
- B. **Fire Number Review** – This item was tabled at the April meeting. The City Council requested more input from the Fire Chief and information on potential grant opportunities. The Fire Chief will be in attendance to discuss the options. The Police Chief will be in attendance to discuss funding opportunities. See Attachment.
- C. **2019-2023 CIP Update** – I will be preparing the draft of the 2019-2023 CIP for the City Council to be reviewed at an upcoming Council meeting. This document will outline what infrastructure and maintenance projects we are looking to do in 2019 and plan for the next 5 to 10 years for the Council to consider. The goal is to approve the CIP update at the August Council meeting which will help establish infrastructure priorities to manage the City's infrastructure and assist with budgeting of city resources.
- D. **8 Wood Duck Pass Variance Request** – I have continued to review and be in contact with the applicant and his septic designer regarding options for a replacement septic system. The proposal is scheduled to be heard at the next Planning Commission meeting, and will likely be brought to a future City Council meeting.
- E. **Address Change for TH 110 Renaming** – I have been working with MnDOT and the County to initiate an address change for the Schroeder residence, 240 Highway 110. Their address will change to 240 Highway 62 on July 1, 2018. SEE ATTACHMENT.
- F. **Update on Request for MnDOT To Address Sight Distance Issue on TH 110**
We received email correspondence from Jon Solberg, South Area Manager for MnDOT regarding this issue. He stated that MnDOT does not have any improvements programmed through 2023, and that the intersection does not have crash rates at the same level as other intersections that are also waiting for funding. He stated that MnDOT is aware of the deficiency, and offered that they would like to

work with Sunfish Lake and IGH to plan for alternative access for existing homes and undeveloped land west of TH 3. He believes alternative accesses are a better solution for the problem because improvements at the current location would be difficult to build because of the close proximity of the wetland. Jon asked if there was interest from Sunfish Lake to work with MnDOT and IGH on a plan for alternative accesses.

- G. **5865 South Robert Trail** – Staff sent a letter to the applicant outlining issues that were found to be out of compliance with their approval. The homeowner, Mr. Birch, has indicated he will be at the City Council meeting to discuss and resolve the issues. SEE ATTACHMENT.

2. Building and Site Reviews in the Month of April.

A building and Site Review has been completed for 2570 Delaware Avenue. The plan consists of removing and replacing the garage, expanding a guest room, as well as adding additional outdoor patio/entertainment space. At this time, comments have been addressed and the application is being considered at the next Planning Commission meeting.

3. Public Works Activities Undertaken in the Month of April.

- A. **Snow Plowing for April** – To date, we have not received an invoice for services in April, however, through March it appears that expenditures are within the City's budgeted amount. I will be monitoring the City streets to make sure issues are resolved and the proper snow removal/ management is utilized. Please notify me at 763-229-1643 if you see any unsafe conditions.

4. Anticipated Public Works Activities for the Month of May.

- A. **Spring Load Limits** – Currently load limits are in effect and load restriction signs are in place. I will be monitoring the conditions and will remove the limits when conditions permit.

The above constitutes the Engineering Report for the City of Sunfish Lake for May 1, 2018.

Respectfully submitted,

WSB & Associates, Inc.



Jeffry S. Sandberg, PE
City Engineer



April 25, 2018

Honorable Mayor and City Council
City of Sunfish Lake
Via Email

RE: REVIEW AND RECOMMENDATIONS TO PROVIDE VISIBLE FIRE NUMBER MARKERS TO PROPERTIES THROUGHOUT THE CITY

Honorable Mayor and Members of the City Council;

In late 2017, the City's Police and Fire staff (first responders) expressed concern that many of the City's properties do not have visible Fire Marker signs to allow them to quickly respond to emergencies. At their meeting on November 7, 2017 the City Council requested that staff perform a field survey/ review of the fire number signs for properties throughout the city and provide a recommendation to the council.

In November 2017, WSB staff performed a drive-by survey of all 262 of the Sunfish Lake properties and classified the signage in one of four different categories; Good, Missing, Hidden/ Blocked, and Tilted.

The following results were documented from our field survey:

Good – 189 properties (72%)
Missing – 39 properties (15%)
Hidden/ Blocked – 18 properties (7%)
Tilted – 15 properties (6%)

In all, 72 of the 262 properties in the city, or 27% of the Fire Markers in the city, are not 100% visible to first responders. In previous discussions with the City Council, it was requested that consideration be given to replacement markers that are two-sided and placed perpendicular to the road. WSB has consulted with several sign vendors to identify sign options and designs. Two different types of signs are being offered for your consideration. The first option is the standard one-sided sign that is used today; the second option is a two-sided sign that would be placed perpendicular to the road for better visibility from either direction.

In an effort to ensure consistency and complete coverage for 100% visible Fire Markers throughout the city, staff requested proposals from 3 vendors. One vendor did not respond because they only supply the markers, they do not install or replace. I offer the following options for the City Council's consideration:

Option 1: Replace all Fire Markers in the City with New 2-sided Markers in Year 1.

This option would result in the city having the **new style 2-sided marker** to be consistently placed and 100% visible for all residences within the city as quickly as possible.

Quotes Received:

Safety Signs: \$26,310.50

Advantage Signs: \$19,911 (Add \$1,404.32 for Galvanized posts)

Option 2: Develop a Five-Year Plan to Replace all Fire Markers in the City with 2-sided Markers

For this option we propose to replace 52 markers per year for five years. We have identified the 72 missing, hidden, or tilted markers as priority for replacement first, and subsequent replacement of all signs in the city with a new standard marker within 5-years time. The proposed schedule would be as follows:

Year 1: Replace all missing markers (39) and (13) hidden or tilted markers.
Year 2: Replace remaining hidden/ blocked or tilted markers (20) and (33) more.
Year 3: Replace 53 markers.
Year 4: Replace 52 markers.
Year 5: Replace 52 markers.

Quotes Received:

Safety Signs: \$6,283/ year; \$31,415.50 total over 5 years

Advantage Signs: \$4,251/ year; \$21,255 total over 5 years (Add \$1,404.32 for Galvanized posts)

This option spreads out the costs over 5 years, and would result in all Fire Markers in the city to be consistently placed and 100% visible with the **new style 2-sided marker**. The missing signs and most of the markers not visible or tilted would be replaced in Year 1, with the remaining hidden or tilted markers being replaced in Year 2.

Option 3: Replace only those Fire Markers in the City that are Missing with Standard 1-sided Marker, and Correct Hidden/ Blocked, or Tilted Markers.

Markers that are missing (39) would be replaced with the **standard one-sided marker**. It is assumed the existing markers for the Hidden, Blocked or Tilted markers are in serviceable condition, so those would be removed from the existing post and attached to a new post in a visible location (33 total). Generally, the markers that are hidden/ blocked are conflicting with trees or landscaping or some other permanent barrier. Trimming may be one option but would require permission from each property owner and it would not likely be a long-term solution. The tilted signs likely either have damaged posts or have been situated that way for a long-enough period of time that trying to push them upright may break or damage the post. We recommend re-using the existing markers that are hidden/ blocked or tilted and installing them on a new post.

Safety Signs: \$6,012

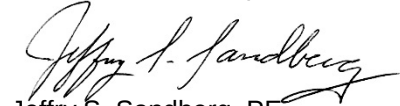
Advantage Signs: \$4,014.65 (Add \$385.92 for Galvanized posts)

This option is the most-cost effective and would result in all Fire Markers to be 100% visible and consistent throughout the city as quickly as possible.

Advantage Signs provided the most cost-effective quotes for all options. Staff requests direction from the City Council on an option above or other options that may be discussed at the City Council meeting on May 1st. If you have any questions or require additional information, please contact me at 651-286-8474.

Sincerely,

WSB & Associates, Inc.



Jeffrey S. Sandberg, PE
City Engineer

Subject: Fire Number Grants, Update

April 19, 2018

Mayor Williams,

Below is an up-date with regards to applying for grant funding to mitigate and improve the residential fire numbers in the City. As you are aware, fire numbers are the primary method of identifying home and property locations. I have identified two potential grant programs that we may be able to apply for funding.

1. All-Hazard Mitigations Funds – FEMA has a program whereby applicants can apply for funds to help mitigate a potential disaster or known adverse impact. Dakota County's All-Hazard Mitigation Plan can be found by clicking [HERE](#). The City of Sunfish Lake's information starts on page 261 of the document. In an application I will try and make the argument having consistent and improved fire numbers will help improve and coordinate emergency services response. I am currently working with FEMA staff out of Chicago to secure an application and find out when funding might be available.
2. HSEM Non-profit Security Grants – This funding is primarily used for hardening targets for potential terrorism (click [HERE](#)). Not that I would be public about this, Sunfish Lake is a prime community for a person to hide with the cover of woods and shoot down commercial aircraft. Having consistent and well-defined fire numbers allows law enforcement to quickly and accurately respond. Moreover, certain residential properties would be more preferable to terrorist than others. These could be rated in some type of database.

I did inquire about several insurance grants, but none had any funding that could be used for our purposes. The HSEM grant is 30 to 45 days out to apply. I have not heard back from FEMA. My guess is the Council might be looking at a 180 day period to apply for funding. The most optimistic schedule would put us at about mid-summer or the beginning of the fall before we would know if funding was awarded. While the fire number issue has been this way for some time, I am not sure how quickly the Council wants this project completed. Please let me know if I should continue pursuing these grants.

Bud Shaver || Chief of Police
West St. Paul Police Department
We Serve with Honor and Integrity
1616 Humboldt Avenue
West St. Paul, Minnesota 55118
651-552-4201 || BShaver@wspmn.gov



April 24, 2018

Mr. Howard Schroeder Jr.
240 Highway 110
Sunfish Lake, MN 55118

RE: Address Change
PID 38-03000-81-010

Dear Mr. Schroeder:

The Minnesota Department of Transportation (MnDOT) is changing the name of Highway 110 to Highway 62, effective summer 2018. The reason for this change is to provide clarity to motorists by having one route, one number on this east/west road. MnDOT has received numerous complaints from motorists not knowing which road they are on in this area, specifically on Highway 55 between Highway 62 and Highway 110 near the MSP airport. This change will also allow all exits along this corridor to have a consistent numbering convention, to ease driver confusion. Unfortunately, this will require an address change for properties that access directly off of TH 110. For more information about this change visit <http://www.dot.state.mn.us/metro/projects/hwy110renamingtohw62/index.html>.

The City of Sunfish Lake has assigned the new address of 240 Highway 62 to your current address of 240 Highway 110. You will need to notify your power company, insurance company, Driver and Vehicle Services, your phone carrier, your cable carrier, your bank(s), voter registration, and any other subscriber services. (This is a reference list to get you started.) Below is a list of places where we have sent information regarding this address change. This address change will be effective July 1, 2018.

If you have any questions, please feel free to call me at 651-286-8474.

Sincerely,

WSB & Associates, Inc.

A handwritten signature in black ink that reads "Jeff Sandberg".

Jeff Sandberg, PE
City Engineer

Cc: City of Sunfish Lake City Clerk
City of Sunfish Lake Code Enforcement
West St. Paul Police Department
City of Mendota Heights Fire Department
Dakota County
Dakota County Dispatch
West St. Paul Post Office



February 7, 2018

Brian and Joyce Birch
5865 South Robert Trail
Sunfish Lake, MN 55120

Re: Final Site Inspection Violations

Dear Mr. and Mrs. Birch:

On Monday, September 25th, 2017, a final site inspection was performed on your property to determine conformance with your building and site plan which was approved from an Engineering standpoint on April 29th, 2016.

During the inspection, there were several areas on the site that did not match the approved plan. These areas include but are not limited to:

- Additional impervious areas not shown on the original plan
 - o Paver patio off the western side of the home
 - o Paver walkways along the western side of the home
 - o Expanded driveway areas not shown on the plan
- Infiltration basin quantity and location do not match the approved plan
 - o Gravel turnaround location originally shown on the southwest side of the driveway was relocated to the northeast side in the location noted as BIOR-SE on the plan
 - o BIOR-SW was not constructed
 - o BIOR-NW appears to have been relocated from the original plan location to an area directly behind the north side of the home. No outlet could be located.
- The proposed retaining wall adjacent to the southeast corner of the garage does not match the approved wall.
 - o This was approved with a max height of 3 feet shown with a straight alignment from the corner of the garage heading to the southeast. A 2-tiered wall exceeding 4 feet in height was built in its place without engineering drawings being submitted or approved.
- A large boulder retaining wall exceeding 4 feet in height was constructed along the north side of the home
- A boulder retaining wall approximately 4 feet in height was constructed south of the garage on the south side of the home
- Grading plan does not match the approved plan

During the inspection, Mr. Birch indicated that the entire driveway drains offsite to the ditch on the east end of his property without any pre-treatment. He also indicated that he is planning on installing a 12'x12' patio on the east side of the home.

Based on these findings, this property was not constructed in accordance with the approved plan.

At their meeting on January 2, 2018, the City Council directed me to send this letter outlining the non-conformance with the approved plans and to outline the following actions that are being requested:

- Remove the unapproved work

Or

- Submit an as built survey of the property.
- Provide a new site plan for review to include the additional impervious area that was constructed above and beyond the original plan as well as the proposed patio noted on the east side of the home for City review.
- Provide infiltration basins to meet the required rate and water quality requirements of the City of Sunfish Lake. An updated stormwater management plan will need to be submitted.

If you have any questions, please contact me at 612-360-1289.

Sincerely,

WSB & Associates, Inc.

For: [Signature]
Don Sterna, PE
City Engineer

Attachment



Patio on west side of home, portion of retaining wall on south side is visible

In process of constructing paver walkway



Walkway along south side of home/garage. Retaining wall south of garage.



Retaining wall off of southeast corner of the garage.