

Ferguson Township Tree Commission (FTTC)

Date October 15, 2018

Meeting Agenda

Time 6:00pm

Call to Order

Thistlewood Tree Planting Discussion

Members of the Thistlewood HOA have been in contact with staff regarding the tree planting project that was planned there previously and has not yet been completed. The FTTC should discuss this project with the HOA to determine number and species of trees to be planted so the project can move forward in 2019. The Arborist has prepared a planting plan for the area.

Approval of Minutes August 20th FTTC Meeting and September 11th Joint Work session

The FTTC shall review and approve the minutes from the last two meetings.

Public Hearing on Tree Removal and Replacement

The FTTC shall hold its annual public hearing on removal and replacement of street trees. The trees were viewed by the FTTC in July, and replacement trees were approved by the FTTC in August.

FTTC Review of SALDO and Zoning Draft Ordinances

The FTTC has been tasked with reviewing the current drafts of the above ordinances and providing comments. The FTTC should discuss this process moving forward including what parts of the ordinances shall be reviewed, a timeline to complete the work, etc.

Arborist report:

The Arborist will review work activities and plan reviews since the last meeting.

Communications to Commission Members

This is an opportunity for FTTC members to report on any contact by residents regarding FTTC matters.

Future agenda items

Tree planting on utilities, SALDO/Zoning Ordinance Review, Tree Preservation Ordinance

Other

The next meeting is Monday November 12th at 5:30pm in conference room 2.

**FERGUSON TOWNSHIP TREE COMMISSION
MEETING MINUTES
MONDAY, AUGUST 20, 2018
5:30 PM**

I. ATTENDANCE

The Tree Commission held its public meeting on Monday, August 20, 2018 at the Ferguson Township Municipal Building. In attendance were:

COMMISSION:

Howard Fescemyer, Chairperson
Darlene Chivers, Vice-Chairperson
Jerry Learn
Marc McDill
Mike Jacobson

STAFF:

Lance King, Arborist
David Modricker, Public Works Director

Others in attendance were: Marcella Bell, Recording Secretary;

II. CALL TO ORDER

Mr. Fescemyer called the Monday, August 20, 2018 Ferguson Township Tree Commission meeting to order at 5:36 PM.

III. JUNE 18, 2018 AND JULY 23, 2018 MEETING MINUTES

Mr. Learn stated that in both the June 18 and July 23 meeting minutes, precedence should be changed to precedent. Mr. Fescemyer provided corrections to the spelling of his last name for both sets of minutes.

A motion was made by Ms. Chivers and seconded by Mr. McDill to approve the corrected June 18, 2018 and July 23, 2018 meeting minutes. The motion carried unanimously.

IV. FTTC-BOS JOINT WORKSESSION

Included in the agenda packet is a draft agenda for the Joint Board of Supervisors and Tree Commission Work Session.

Mr. Fescemyer reviewed the draft agenda, which included the following items: Tree Preservation Ordinance Introduction by Mr. Fescemyer, Tree Preservation Ordinance Regulations and Examples by Dr. Elmendorf, and Tree Canopy Survey by Dr. McDill.

Mr. Modricker explained that he asked the Board for this joint meeting because he didn't want the Tree Commission to waste its time by creating an ordinance if the Board was not in favor of it. He went on to say that staff met with Dr. Elmendorf a while back to discuss a tree preservation ordinance. Dr. Elmendorf will attend the joint work session to discuss examples of tree preservation ordinances and the legality behind this type of ordinance.

There was a lengthy discussion regarding green infrastructure. The Tree Commission would like to have a discussion with the Board of Supervisors regarding how to achieve Sustainable Community goals through green infrastructure. Mr. McDill stated that increasing the tree canopy can do a lot to meet several Sustainable Community goals. Mr. McDill would like to give a presentation to the Board of Supervisors regarding the benefits of growing the Township's tree canopy and ways to do so. He stated that assuming the Board is interested in integrating concepts of green infrastructure in the way the Township plans, the next step would be to meet with the Planning Commission.

Ms. Chivers stated that overall, the point of the work session is to ask the Board of Supervisors to make a commitment to trees in the Township and to think about trees as solutions to many problems. Ferguson Township is committed to improving livability, and planting and preserving as many trees as possible can add to that. She went on to say that it's a simple statement that is ambitious and has an outcome.

There was a general consensus from the Tree Commission to add "Increasing Livability and Greening the Urban Landscape" as an agenda item to the joint work session. Ms. Chivers and Mr. McDill will provide comments on behalf of the Tree Commission regarding the value trees and vegetation can play in improving water quality goals, wildlife habitat, air quality and temperature (including planting tree lined connected non-motorized transportation corridors), and planting "no-mow" vegetation and trees in storm water basins.

V. ROOT/SIDEWALK/DRIVEWAY CONFLICTS

Mr. King stated that the FTTC has had the opportunity to field view a few sites with these issues. The FTTC should provide a recommendation to staff regarding handling future conflicts between street tree roots, sidewalks, and driveways.

Mr. Learn stated that the narrative provided by the resident painted a much worse picture than it actually is. He stated that his recommendation is that the Tree Commission does nothing.

Ms. Chivers stated that if the Township wants residents to like street trees, then it might be reasonable for the Township to help with the cost of replacing the sidewalk/driveway. Mr. McDill stated that when the issue of a tree damaging a sidewalk to driveway is raised by a resident, the Township should visit the site to determine if there is anything to be done about the tree in question, whether it be root barriers or trimming roots; however, the Township should not pay the cost to replace sidewalks or driveways.

Mr. King explained that the Township does do that; however, a lot of people do not call when there is an issue.

After a brief discussion, there was a general consensus from the Tree Commission for Mr. King to continue to work with residents who have these conflicts to mitigate the issues when they arise.

VI. PLANTING OPPORTUNITY ISSUES

Mr. King explained that he has continued to work on the tree planting project in the Stonebridge neighborhood for 2019. Several conflicts have come up regarding underground utilities. The FTTC should make recommendations for this project and similar projects in the future.

Mr. King stated that Stonebridge has been a good model for moving forward with these types of planning projects. The next step for this project is to put in a design one call to mark where the utilities are for the locations of the tree plantings. However, the issue is that when a design one call is placed, utility providers are not required by law to mark their lines. The only time a utility provider is required to mark their lines is when an excavation is planned for that location, which can only be made 10 days or less of when the work is taking place. The Township's policy is to not plant trees on top of utility lines. Mr. King stated that he laid out the planting where he thought would be a good place for the trees, however, he won't know if there is a utility line in that location until 10 days before the plantings occur. Therefore, Mr. King could end up with trees and no place to plant them.

After a brief discussion, the Tree Commission agreed to continue this discussion at the October meeting with Mr. Modricker.

VII. 2019 STREET TREE PLANTING

Mr. King provided maps showing the approved tree removals for 2018 and the proposed replacement species. He asked the Tree Commission to approve the replacement species before letters are sent to the affected property owners.

In response to a question from Mr. Jacobson, Mr. King explained that he selected the Hornbeam species because the Township is cutting down on the amount of species it plants in each contract and the trees on Martin Street have not done very well and is in need of some columnar trees. There was a brief discussion on the tree species to plant instead of the Hornbeam species. There was a general consensus from the Tree Commission to not plan any Hornbeam trees and replace them with Tree Lilacs on Martin Street and a mix of Ginkgo and Oak Trees on Old Gatesburg Road.

The Tree Commission then had a brief discussion on future planting opportunities like Deepwood Drive or Bristol Avenue.

VIII. OAK WILT UPDATE

Mr. King provided the Tree Commission with an update on the Township's Oak Wilt program. He explained that a case of Oak Wilt has been confirmed for a parcel

off of Beaver Branch Road in the Rural Residential District. There are 43 trees listed for treatment and 1 tree for removal. The total estimate for the cost of work is \$13,500.00. The diameter of the tree being removed is at least 30 inches and has to be chipped and/or buried. The wood cannot be used for firewood or lumber. The chippings will go to UAJA to be mixed in with compost product which kills the fungi.

IX. ARBORIST REPORT

Mr. King stated that he did inspections and a few parks for tree removals and pruning. He attended a ISA conference in Columbus, Ohio the week prior. Mr. King has been in contact with the property manager of the Heights and the landscaper of the property to discuss the removal of excess mulch on trees.

There was a brief discussion regarding the cancelling of the regular meeting of the Tree Commission in September due to the joint work session with the Board of Supervisors on September 11. There was a consensus from the Tree Commission to cancel the regular September Tree Commission meeting.

Mr. Fescemyer asked Mr. King if the Pine Hall developer responded to the Tree Commission's comments on the Pine Hall Master Plan. Mr. King will contact the developer and get back to the Tree Commission on this matter.

X. COMMUNICATIONS TO COMMISSION MEMBERS

There was none.

XI. ADJOURNMENT

With no further business, the August 20 18, 2018 Tree Commission meeting was adjourned at 7:54 PM.

RESPECTFULLY SUBMITTED,

David Modricker, Director of Public Works
For the Tree Commission

FERGUSON TOWNSHIP
JOINT BOARD OF SUPERVISORS AND TREE COMMISSION WORK SESSION MINUTES
TUESDAY, SEPTEMBER 11, 2018
6:00 PM

I. ATTENDANCE

Board of Supervisors:

Peter Buckland
Steve Miller
Laura Dininni
Sara Carlson, absent
Tony Ricciardi, absent

Tree Commission:

Howard Fescemyer
Darlene Chivers
Marc McDill
Jerry Learn
Mike Jacobson

Township Staff:

David Pribulka
David Modricker
Lance King

Others in attendance were: Dr. Bill Elmendorf, Tree Preservation Ordinance; Marsha Whitehead, resident; and Bill Keough, Planning Commission member

II. CALL TO ORDER

Mr. Buckland called the Joint Board of Supervisor and Tree Commission Work Session to order at 6:00 p.m.

III. INCREASING LIVABILITY AND GREENING THE URBAN LANDSCAPE – DR. MCDILL AND MS. CHIVERS

Dr. McDill and Ms. Chivers provided a presentation to the Board of Supervisors regarding increasing livability in the Township and greening the urban landscape.

The vision of the Tree Commission is to maintain and increase tree coverage and create connected ribbons of green throughout the Township. The objectives include climate mitigation and adaptation, stormwater management and water quality issues, and to improve and maintain the desirability of Ferguson Township as an attractive, healthy place to live. Trees would help each of these objectives by heat reduction for streams, people, residences, and animals related to climate mitigation; create greater infiltration, reduce flooding, and reduce pollution related to stormwater management. Trees improve urban open spaces for wildlife and recreation in Ferguson Township.

Dr. McDill and Ms. Chivers reviewed the tools that can be used to achieve the objectives previously mentioned:

-) Land-use planning, including input from the Tree Commission to the Planning Commission
-) Initial inventory and GIS to map green infrastructure
-) Community involvement
-) Strategic Plan
-) Revise guidelines and regulations for new developments, both residential and commercial
-) Increase tree numbers on walking and biking paths
-) Increase connectivity between parks and neighborhoods and paths
-) Increase the tree canopy cover
-) Replace impervious surfaces with pervious surfaces

-) Redesign parking lots and street parking (curb design and using tree wells for street trees)
-) Redesign retention basins (rain gardens and bioswales)
-) Use green roofs
-) Use reflective pavement

Dr. McDill and Ms. Chivers reviewed several guiding principles that work alongside the tools mentioned previously.

There should be greater coordination among the Tree Commission, Planning Commission, Parks and Recreation Committee, and the governing body that establishes construction standards. These commissions and committees should have a mindset that places green infrastructure as a top priority in any kind of planning.

The Tree Commission recommends to the Board of Supervisors that the Township take a more holistic approach in designing developments, bike paths, roads, stormwater management facilities, and parking lots to include more green-design elements. The Township should adopt a tree canopy cover goal (at a neighborhood level) as a sustainability indicator and set explicit goals for increasing the tree canopy cover. Lastly, the Township should review the Subdivision and Land Development Ordinance (SALDO), the Zoning Ordinance, and construction standards to include more green design principles.

IV. TREE PRESERVATION ORDINANCE INTRODUCTION – MR. FESCEMYER

Mr. Fescemyer gave a presentation to the Board of Supervisors as an introduction to further a tree preservation ordinance.

He spoke to the benefits of urban community tree preservation. Urban community tree preservation benefits the environment, economy, and society. The environmental benefits include stormwater management, air filtration and production, and preserves wildlife habitats. Economic benefits include energy savings for residents and businesses, raises property values, and helps retail sales. Societal benefits include community, beautification, and health. He went on to explain that 1,000 trees alone can save \$3,500 in annual stormwater runoff costs. It can also save \$10,000 in annual energy savings. 1 tree equals 90 pounds of carbon dioxide and absorbs 10 pounds of air pollution annually. Shaded business districts increase business revenues by 11% annually. Research shows that apartment buildings with trees had 52% fewer crimes than those without trees. Research also shows that 1 tree within 50 feet of a residential house increases the house value by 9%.

Mr. Fescemyer reviewed possible sections of a tree preservation ordinance. These sections include trees on private land to be developed in the future, preservation of trees on existing residential and commercial properties, and the expansion of tree preservation on Township-owned land.

Mr. Fescemyer stated that there are many ways to preserve trees on private land that may be developed in the future. Restricting the removal of trees greater than a specified diameter, providing appropriate exceptions and incentives to preserve trees, requiring replacement of trees removed, protecting existing trees during development, and specifying proper methods and approval for tree maintenance are several ways to preserve trees on private land. Mr. Fescemyer

went on to explain that these suggestions also work for the preservation of trees on existing residential and commercial properties.

Mr. Fescemyer spoke about the expansion of tree preservation on Township-owned land beyond the existing street tree planting program. He stated that the Township can establish a tree bank or endowment program. The Township could regularly assess and inventory public trees and measure the canopy cover on public and private land. To help expand the tree preservation program, the Township could purchase private, undevelopable tracts of woodland or easements. Another way to continue the expansion is to provide assistance to residents with trees of historical or other significance as well as continue to educate the public about the benefits of trees.

Mr. Fescemyer stated that in summary, trees and associated vegetation provide economic and aesthetic benefits. Protecting trees into the future requires the inclusion of private land in the Township Tree Plan.

There was a brief discussion between the Board members regarding a tree preservation ordinance and the Zoning and Subdivision and Land Development Ordinance (SALDO) update. The Board asked if the consultant working on the ordinance update, Environmental Planning & Design (EPD), could incorporate these ideas into the rewrite so that the Board could provide comments on the updated ordinance.

V. TREE PRESERVATION ORDINANCE REGULATIONS AND EXAMPLES – DR. ELMENDORF

Dr. Elmendorf, Ibberson Chair in Urban and Community Forestry at Penn State University, provided insight on tree preservation ordinances in other municipalities in Pennsylvania. He stated that tree protection ordinances exist in Pennsylvania, especially in large growth areas, such as the Poconos. The idea is to get existing trees on the design radar during land development planning so that there is an idea of what is there and what trees should be saved during development.

Dr. Elmendorf explained that many tree preservation ordinances are placed into the municipality's zoning ordinance; however, some tree preservation ordinances are also incorporated into the municipality's SALDO, natural features, or stormwater ordinances. In the instance of tree preservation on private property, most tree preservation ordinances are placed into the zoning ordinance.

Dr. Elmendorf stated that the purpose behind a tree preservation ordinance is more than just aesthetic benefits. Water quality, stormwater management, increased property value, climate, and energy benefits are important as well and need to be clearly written within the ordinance. Within the tree preservation ordinance, technical and important terms need to be well defined, such as heritage tree, tree protection zone, dripline, and tree risk.

Dr. Elmendorf stated that it is important to decide when the tree preservation is applicable. What permit application would initiate the ordinance? Would it be initiated from an earth disturbance, grading, demolition, the act of building a structure, the SALDO, or the zoning ordinance? He went on to say that on the opposite spectrum, which ordinances are not applicable to the tree preservation ordinance? If a timber harvest is completed on a parcel what would happen if a SALDO application was applied for five months later?

In addition to ordinance applicability, it is important to define what size and species of trees would be protected, as well as the percent of canopy cover. There are different ways to accomplish this in an ordinance. The ordinance could specify that all trees over 6 inches in diameter at breast height (DBH) will be considered on the land development plan and no more than 25% will be removed. Another way to accomplish tree preservation is to describe the percentage of canopy that is allowed to be removed or protected. This can vary throughout different districts and developments in the municipality.

Dr. Elmendorf reviewed tree preservation application requirements to be laid out in the ordinance. Application requirements for permits or approved plans should include the tree inventory of the parcel; a horticulture report; a tree preservation plan; or a tree survey plan showing trees or boundaries of trees to be preserved, removed, and encroached upon by pruning; and a tree protection plan. The ordinance should include who reviews and approves the permits and plans as well as the appeal process. There should also be a post construction inventory and inspection. Dr. Elmendorf explained that tree protection standards can be very extensive if the municipality wishes it to be. The ordinance can include things like a preconstruction meeting, fencing requirements, branch and root pruning standards, and root preservation techniques.

Dr. Elmendorf spoke to credits for tree preservation. He explained that standards are typically created to equate preserved tree diameters or percentages of tree canopies with buffers and landscape credits. The municipality can also consider other credits like parking and stormwater management requirements.

Dr. Elmendorf stated that replacement tree requirements will need to be detailed in the ordinance. First, the species, size, and number of trees that will be provided for replacement of removed trees needs to be defined in the ordinance. There should also be standards for substituting larger trees or other vegetation on a development. Could replacement trees be planted off-site or considered in an in-lieu account? The ordinance should account for protection, bonding, and maintenance of replacement trees and vegetation. Dr. Elmendorf stated that 18 months is usually the minimum amount of time to certify that the replacement trees survive.

Dr. Elmendorf stated that violation and penalties should also be addressed in the ordinance. This section can vary and is dependent on the type of ordinance and permits involved, whether it be zoning, SALDO, or other ordinances. He explained that some municipalities treat these violations as a summary offense. Other municipalities have special and additional penalties for the removal of heritage trees. Some municipalities in other states have clauses for restitution.

The discussion thereafter revolved around the feedback from the Tree Commission regarding the proposed Zoning Ordinance and SALDO revisions. There was also a brief discussion on having a Tree Commission liaison on the Zoning and SALDO update committee as well as the Stormwater Fee Feasibility Study Committee.

Mr. Keough, Ferguson Township Planning Commission member, stated that regarding the tree preservation ordinance, there needs to be definitions on what parts of the Township are urban versus rural.

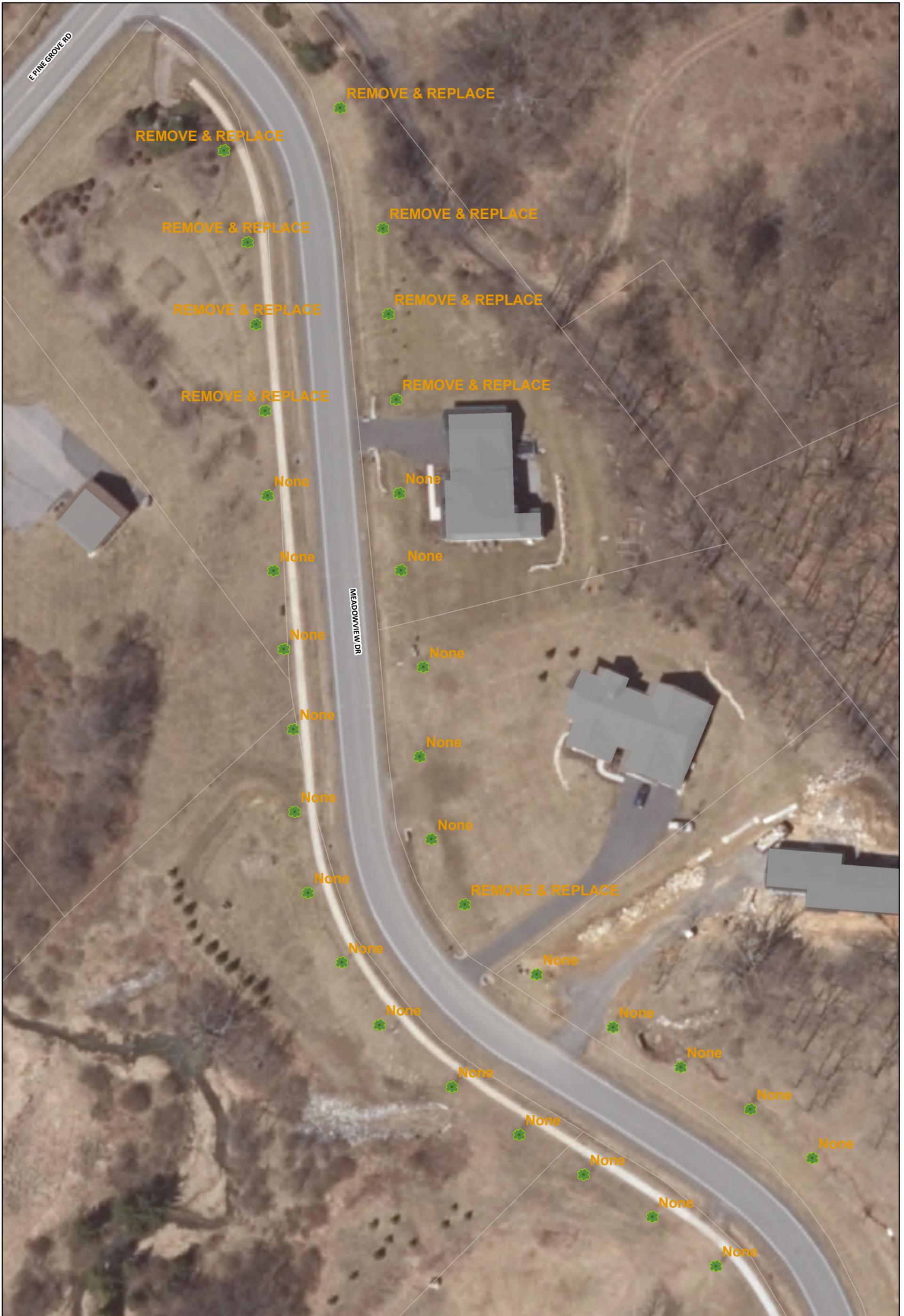
VI. TREE CANOPY SURVEY – DR. MCDILL

Dr. McDill stated that the Township cannot monitor the tree canopy if it has not been measured. He stated that the best way to measure the tree canopy is to do it neighborhood by neighborhood within the urban areas. Dr. McDill stated that as an example, the Park Hills and Park Forest tree canopy may be declining; however, the Saybrook neighborhood young tree canopy is growing. He went on to explain that the Township needs measurable metrics that produce data. The Township can also reconstruct the tree canopy based on old LIDAR data. Dr. McDill noted that the state will do it for the Township for free, however, it won't be sectioned out neighborhood by neighborhood. The Township may also be able use Google Earth imagery as well as Centre County imagery. Mr. Fescemyer added that the environmental benefits of trees start with measuring the canopy.

VII. ADJOURNMENT

With there being no further discussion, the work session adjourned at 7:50 p.m.

Respectfully Submitted,



Thistlewood Tree Removals and Replacements
 2019 - C13 Street Tree Plantings

 Existing Street Trees

