

# MEMORANDUM



**TO:** MEMBERS OF THE PLANNING COMMISSION  
**FROM:** CHRISTIAN CARROLL, PLANNER  
**SUBJECT:** BOLINGBROOKE LOT 15 WOODLAND PERMIT  
**DATE:** OCTOBER 14, 2020

---

The applicant, Bashar Yalldo, seeks approval of a Woodland Use Permit, PWD20-0007, to remove twenty-five regulated woodland trees ranging in size from 8 to 24 inches diameter-at-breast-height (DBH) from a lot located at 43854 Bolingbrooke Lane, also known as Lot 15, Bolingbrooke Estates Subdivision. The subdivision is located north of Twelve and a Half Mile Road and west of Old Novi Road in Section 10 of the City. The Planning Commission reviewed the plans for Bolingbrooke Estates Subdivision in 2017 and approved a Woodland Use Permit for the Subdivision, which included the removal of approximately twenty-eight regulated woodland trees that were located within the approved building area of the lot. The applicant is requesting the removal of twenty-five regulated woodland trees to construct a pool on the lot.

The City's Environmental Consultant reviewed the request and prepared a review letter dated October 6, 2020. Based on the attached site plan survey, the property contains trees that are considered regulated by the City of Novi as they are greater or equal to 8-inches DBH and located within an area mapped as Regulated Woodland. The twenty-five regulated woodland trees proposed for removal are located outside the approved building area for the subdivision and therefore a Woodland Use Permit is required unless the trees are deemed dangerous to the public safety, health, or welfare of the residents by the City Forester. In this case, the City Forester determined that two of the regulated woodland trees in this request were deemed dead and dangerous during an on-site inspection and will not require Woodland Replacement Credits.

It should be noted that this request would not preserve any regulated woodland trees on the lot. The applicant has indicated a desire to keep some of the regulated woodland trees, but is unsure if all regulated woodland trees will need to be removed and is therefore requesting a woodland use permit for the removal of all twenty-five regulated woodland trees on the site. This is because the plans for the pool on-site have yet to be finalized. Per the consultant's review letter, the applicant shall indicate how many trees will be removed prior to issuance of a Woodland Use Permit. If all twenty-five regulated woodland trees are to be removed, thirty-two Woodland Replacement Credits would be required. It is unclear whether the applicant intends to replace the trees on-site or pay into the City of Novi Tree Fund, but the City's Environmental Consultant suggests that the applicant attempt to replace the required Woodland Replacement Credits on the property.

Of the twenty-five trees proposed for removal, two trees are within a conversation easement and may **not** be removed. Of the remaining twenty-three trees that may be requested for removal, approximately eleven trees are within the influence of the proposed pool project, as referenced in ECT's review letter. Two of the eleven trees were considered dead by the City Forester and will not require Woodland Replacement Credits. It is of staff's recommendation that the remaining twelve trees that are not within the influence of the proposed pool project shall be preserved. Therefore,

staff recommends that only eleven of the twenty-five regulated woodland trees be approved for removal. This would require 11 Woodland Replacement Credits.

Section 37-26 of the Woodland Protection Ordinance states the following:

(b) Where a final subdivision plat or a final site development plan which includes activities regulated by this chapter has been reviewed and approved by the city in conformance with the requirements of this chapter, such approval together with any additional terms and conditions attached thereto shall be considered to have completed the requirements for a permit under this chapter which shall then be issued by the city.

(c) Unless the requirements of this chapter can be satisfied by the setting aside without encroachment of sufficient woodland areas, the developer of a single-family residential subdivision plat or single-family residential site condominium shall, as a part of use permit approval under this article, designate building areas for all structures and impervious surfaces on each subdivision lot or site condominium unit. Once such building areas have been approved and made a part of the use permit, no additional woodland use permit shall be required for the erection of structures within such a building area. **Activities on a subdivision lot or site condominium unit that extend beyond the confines of such a designated building or impervious area shall require an additional approval pursuant to this chapter, which shall only be approved when it is not otherwise feasible to utilize the lot or site condominium unit for single-family residential purposes.**

Per the City of Novi's Woodland Ordinance, where a proposed activity (i.e. home construction) does not otherwise require site plan or plat approval, the granting or denying of the (woodland) use permit shall be the responsibility of the Planning Commission. The applicant shall obtain approval of the Plan from Planning Commission prior to issuance of any permits. The Planning Commission is asked to hold the public hearing and either approve or deny the requested woodland removal permit.

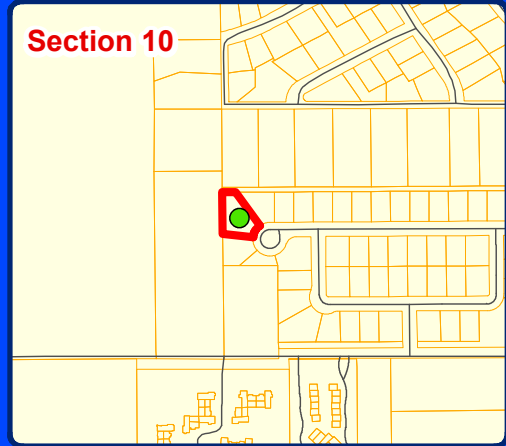
**SUGGESTED MOTION:**

**To approve Woodland Use Permit, PWD20-0007, for the removal of eleven regulated woodland trees within an area mapped as City Regulated Woodland. The approval is subject either to payment for the Woodland Replacement Credits into the City's Tree fund or subject to the planting of woodland replacement trees on site as shown on a woodland replacement plan, the preservation of the remaining regulated woodland trees and understory on the property, and any other conditions as listed in the Environmental Consultant's review letter.**

MAPS  
Location  
Zoning  
Future Land Use  
Natural Features

# PWD20-0007 BOLINGBROOKE LOT 15 WOODLAND PERMIT

## LOCATION



### LEGEND

 Subject Property



### City of Novi

Dept. of Community Development  
City Hall / Civic Center  
45175 W Ten Mile Rd  
Novi, MI 48375  
[cityofnovi.org](http://cityofnovi.org)

Map Author: Christian Carroll  
Date: 10/2/20  
Project: Lot 15 Bolingbrooke  
Version #: 1



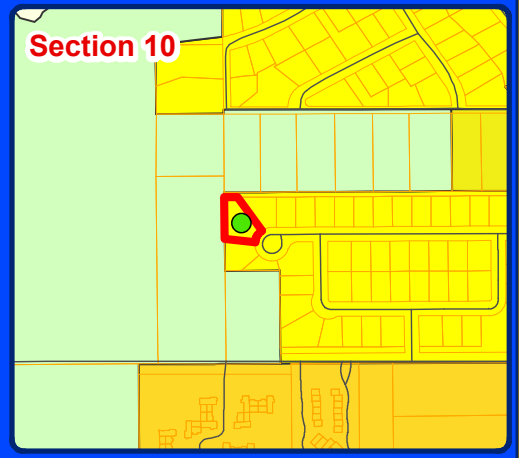
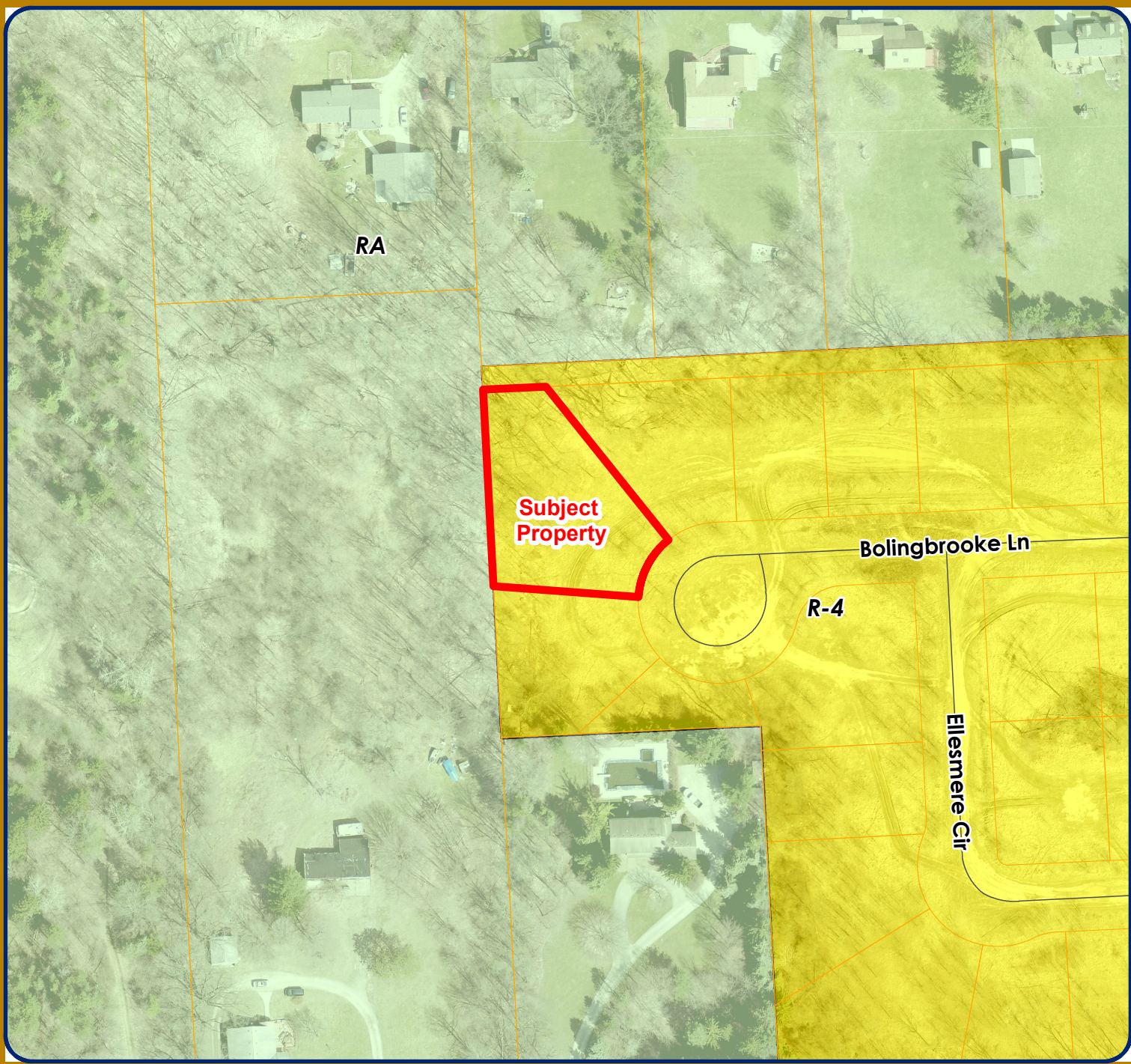
1 inch = 125 feet



#### MAP INTERPRETATION NOTICE

Map information depicted is not intended to replace or substitute for any official or primary source. This map was intended to meet National Map Accuracy Standards and use the most recent, accurate sources available to the people of the City of Novi. Boundary measurements and area calculations are approximate and should not be construed as survey measurements performed by a licensed Michigan Surveyor as defined in Michigan Public Act 132 of 1970 as amended. Please contact the City GIS Manager to confirm source and accuracy information related to this map.

# PWD20-0007 BOLINGBROOKE LOT 15 WOODLAND PERMIT ZONING



**LEGEND**

- R-A: Residential Acreage
- R-1: One-Family Residential District
- R-4: One-Family Residential District
- RM-1: Low-Density Multiple Family
- B-3: General Business District
- Subject Property

**City of Novi**

Dept. of Community Development

City Hall / Civic Center

45175 W Ten Mile Rd

Novi, MI 48375

[cityofnovi.org](http://cityofnovi.org)

Map Author: Christian Carroll  
 Date: 10/2/20  
 Project: Lot 15 Bolingbrooke  
 Version #: 1

Feet

0 25 50 100 150

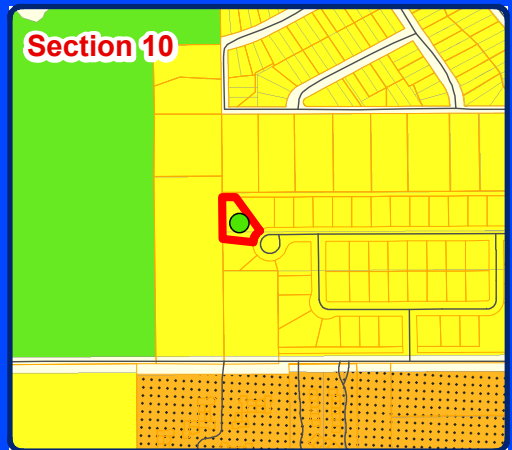
1 inch = 125 feet

**MAP INTERPRETATION NOTICE**

Map information depicted is not intended to replace or substitute for any official or primary source. This map was intended to meet National Map Accuracy Standards and use the most recent, accurate sources available to the people of the City of Novi. Boundary measurements and area calculations are approximate and should not be construed as survey measurements performed by a licensed Michigan Surveyor as defined in Michigan Public Act 132 of 1970 as amended. Please contact the City GIS Manager to confirm source and accuracy information related to this map.

# PWD20-0007 BOLINGBROOKE LOT 15 WOODLAND PERMIT

## FUTURE LAND USE



### LEGEND

- Single Family
- PD1
- Pavillion Shore Village
- Public Park
- Subject Property



### City of Novi

Dept. of Community Development  
City Hall / Civic Center  
45175 W Ten Mile Rd  
Novi, MI 48375  
cityofnovi.org

Map Author: Christian Carroll  
Date: 10/2/20  
Project: Lot 15 Bolingbrooke  
Version #: 1



1 inch = 125 feet

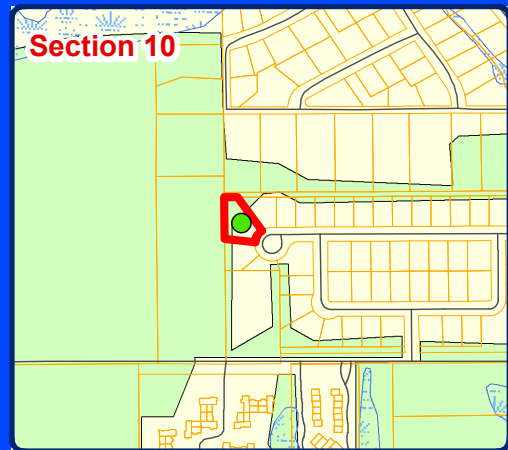


### MAP INTERPRETATION NOTICE

Map information depicted is not intended to replace or substitute for any official or primary source. This map was intended to meet National Map Accuracy Standards and use the most recent, accurate sources available to the people of the City of Novi. Boundary measurements and area calculations are approximate and should not be construed as survey measurements performed by a licensed Michigan Surveyor as defined in Michigan Public Act 132 of 1970 as amended. Please contact the City GIS Manager to confirm source and accuracy information related to this map.

# PWD20-0007 BOLINGBROOKE LOT 15 WOODLAND PERMIT

## NATURAL FEATURES



**LEGEND**


- WETLANDS
- WOODLANDS
- Subject Property



**City of Novi**  
Dept. of Community Development  
City Hall / Civic Center  
45175 W Ten Mile Rd  
Novi, MI 48375  
[cityofnovi.org](http://cityofnovi.org)

Map Author: Christian Carroll  
Date: 10/2/20  
Project: Lot 15 Bolingbrooke  
Version #: 1

0 25 50 100 150 Feet  
1 inch = 125 feet



**MAP INTERPRETATION NOTICE**

Map information depicted is not intended to replace or substitute for any official or primary source. This map was intended to meet National Map Accuracy Standards and use the most recent, accurate sources available to the people of the City of Novi. Boundary measurements and area calculations are approximate and should not be construed as survey measurements performed by a licensed Michigan Surveyor as defined in Michigan Public Act 132 of 1970 as amended. Please contact the City GIS Manager to confirm source and accuracy information related to this map.

PLOT PLAN



# PLOT PLAN



**LEGAL DESCRIPTION:**  
 UNIT 15 OAKLAND COUNTY CONDOMINIUM SUBDIVISION  
 PLAN No. 2216 A.K.A. "BOLINGBROOKE" SUBDIVISION,  
 PART OF THE NE 1/4 OF SECTION 10, T. 1 N., R. 8 E.,  
 CITY OF NOVI, OAKLAND COUNTY, MICHIGAN, AS  
 RECORDED IN LIBER 51425, PAGE 378, OAKLAND COUNTY  
 RECORDS.

**SITE BENCHMARK:**  
 HYD. ARROW LOCATED NEAR  
 LOT 16/DURHAM PARK  
 I.E. 969.71  
 NAVD 88

- LEGEND:**
- STORM SEWER
  - SANITARY SEWER
  - WATER MAIN
  - PUBLIC UTILITIES
  - LIMIT OF DISTURBANCE
  - SWALE
  - SLT FENCE
  - REAR YARD INLET
  - FILTER
  - GRAVEL ACCESS DRIVE
  - PROP. GRADE

**RECEIVED**  
**AUG 30 2018**  
 CITY OF NOVI  
 COMMUNITY DEVELOPMENT

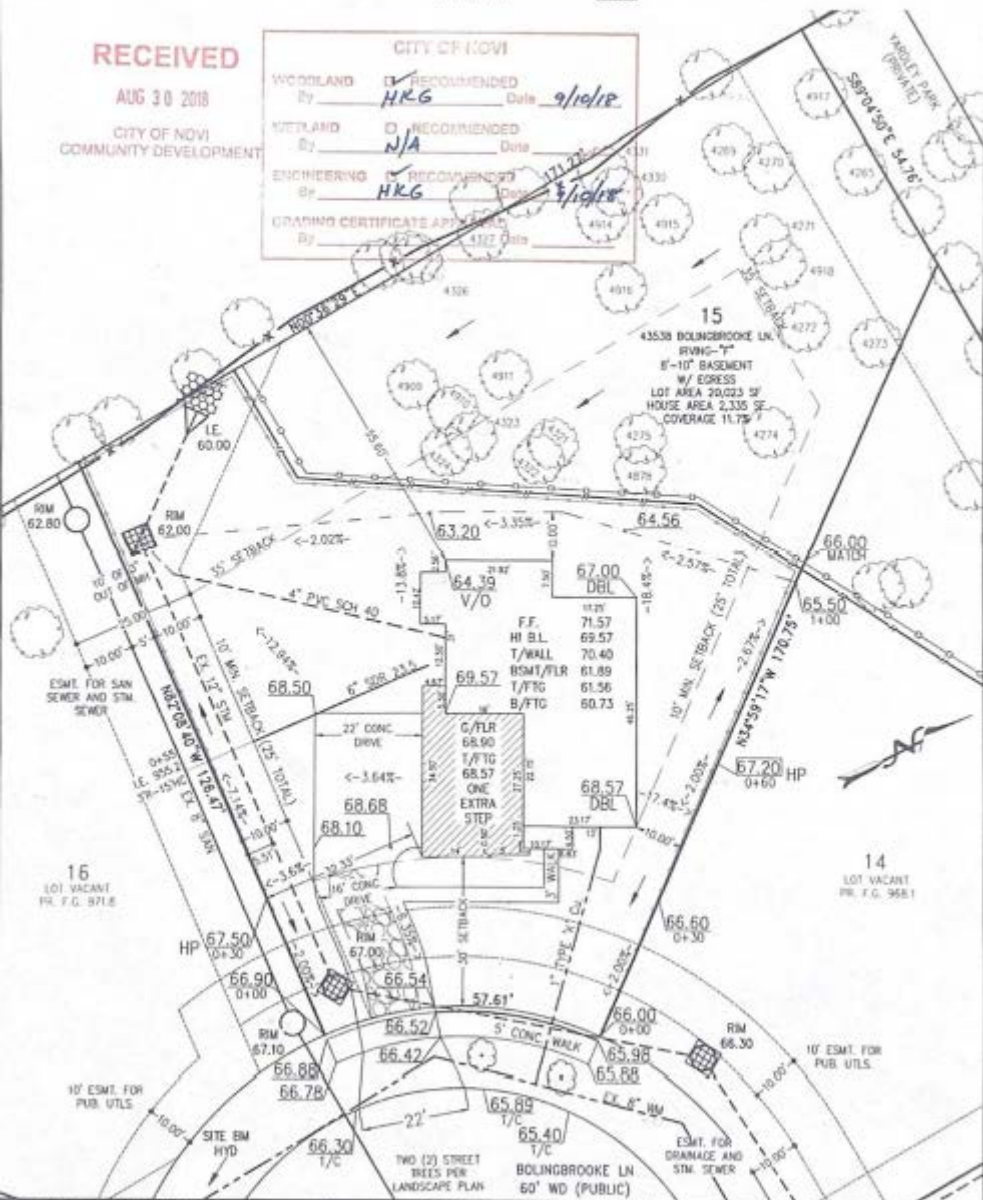
**CITY OF NOVI**

WOODLAND  RECOMMENDED  
 By HKG Date 9/10/18

METLAND  RECOMMENDED  
 By N/A Date

ENGINEERING  RECOMMENDED  
 By HKG Date 8/10/18

GRADING CERTIFICATE APPROVED  
 By  Date



P.P. DATE: 07-23-18\*

G.C. DATE:

PREPARED FOR:

**SINGH HOMES, L.L.C.**

7125 ORCHARD LAKE RD, SUITE 200  
 WEST BLOOMFIELD, MI 48325-3005  
 PH: (248) 865-1600

SCALE: 1" = 20'

SHEET: 1 OF 2

DESIGNED & SURVEYED:

**MLP**  
 AND ASSOCIATES, INC.

SURVEY NO.: 2017.27-SNG - L15 EPH

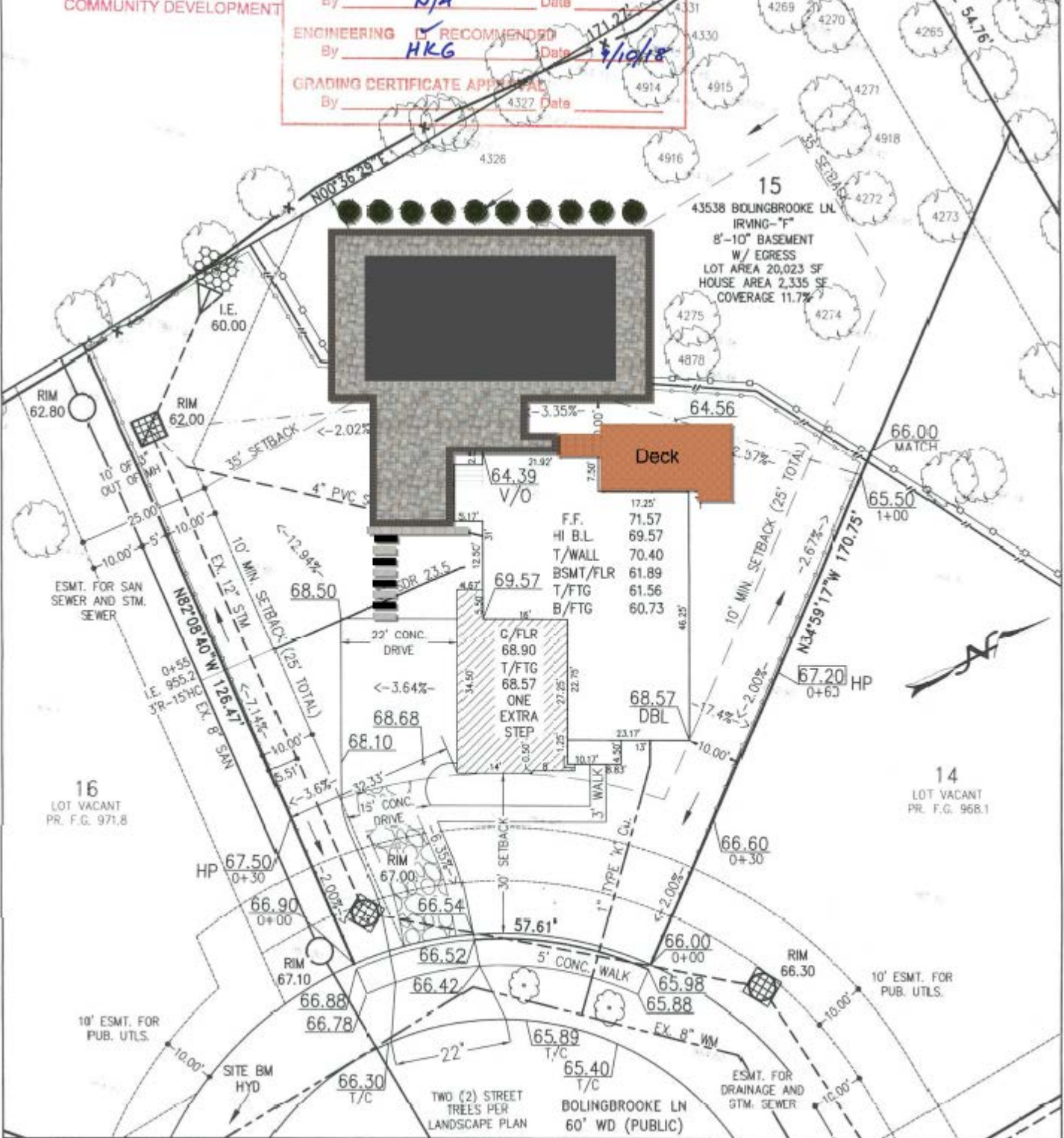
4088 WOPPERNACH ROAD  
 CANTON, MICHIGAN 48047  
 PHONE: (734) 498-8888  
 FAX: (734) 498-8888

By: E.M. Priest  
 Registered Professional Engineer

FBR 18-0445

By N/A Date 1/17/18  
By HKG Date 4/10/18  
By 4327 Date 4/10/18

ENGINEERING  RECOMMENDED  
GRADING CERTIFICATE APPROVAL



F.F.	17.25'
HI B.L.	71.57
T/WALL	69.57
BSMT/FLR	70.40
T/FTG	61.89
B/FTG	61.56
B/FTG	60.73

P.P. DATE: 07-23-18\* SCALE: 1" = 20' SURVEY NO.: 2017.27-SNG - L15 EPH  
 G.C. DATE: SHEET: 1 OF 2  
 PREPARED FOR: SINGH HOMES, L.L.C. ENGINEERS & SURVEYORS  
 \*08-15-18 REV. PER CITY \*08-28-18 REV. PER CITY  
 7125 ORCHARD LAKE RD, SUITE 200 WEST BLOOMFIELD, MI 48325-3005  
 PH: (248) 865-1600  
**MLP** AND ASSOCIATES, INC.  
 40655 KOPPERNICK ROAD CANTON, MICHIGAN 48187  
 PHONE (734) 459-8600 FAX (734) 459-2585  
 By: *[Signature]* Registered Professional Engineer

FBR18-0445

CONSULTANT REVIEW

TO: Patricia Deering, City of Novi Account Clerk  
Katherine Oppermann, City of Novi Account Clerk

FROM: Pete Hill, P.E., P.H.

DATE: October 6, 2020 (Revision 1)  
(Original Submittal September 3, 2020)

RE: Application for Administrative Woodland Evaluation  
PWD20-0007 43854 Bolingbroke Lane  
Stamped "Received" by the City of Novi Community Development Department on  
August 28, 2020

---

Environmental Consulting & Technology, Inc. (ECT) has reviewed the Application for Administrative Woodland Evaluation stamped "Received" by the City of Novi Community Development Department on August 28, 2020 (Plan) for the above-referenced lot for conformance with the requirements of the City's Woodland Ordinance Chapter 37. The current Plan proposes the construction of a pool. The applicant has provided the following information with this submittal:

- a) A copy of the original plot plan for Lot 15 (PBR18-0445);
- b) A copy of the relatively conceptual pool design.

**ECT recommends that the applicant address the items noted in the *Woodland Comments* section of this letter prior to the submittal of a complete plot plan for construction and prior to issuance of building permits for construction on the pool on this lot. In addition, per the City's Woodland Ordinance, the applicant shall obtain approval of the Plan from Planning Commission prior to issuance of Building Permits.**

#### **Woodland Evaluation**

ECT previously completed a Woodland Evaluation for the above referenced parcel at the time of approval of the overall Bolingbrooke development plan (JSP17-0034) project. Approximately twenty-eight (28) trees were removed from this lot in 2005 to create a building envelope for the lot. The trees that the applicant is currently requesting to remove were preserved at the time of site grading for the overall development as they were on the 'save' side of the site's tree protection fencing. The lot currently contains twenty-five (25) remaining trees.

The submittal does not include a tree list for the existing/remaining trees on the Lot. In addition, the submittal does not specifically identify which trees are proposed for removal in order to complete the construction of the proposed pool. The application does state that the applicant would "like to be able to remove the trees and clear the lot so that I will be able to put a pool in place".

#### **Proposed Woodland Impacts and Replacement**

Although the Plan does not specifically identify which of the remaining/existing trees they intend to remove, the following table identifies the remaining trees on this Lot per the approved Bolingbrooke site plan:

No.	Tree #	DBH	Type	Replacements Required If Authorized to Remove
1	4265	12"	Oak	2
2	4269	9"	Ash	1
3	4270	9"/10"	Hickory	3
4	4271	9"	Black cherry	1
5	4272	8"	Hickory	1
6	4273	9"	Black cherry	1
7	4274	15"	Ash	2
8	4275	10"	Sugar maple	1
9	4321	13"	Ash	2
10	4322	8"	Black cherry	1
11	4323	12"	Black cherry	0 (dead)
12	4324	16"	Black cherry	0 (dead)
13	4326	17"	Basswood	2
14	4327	24"	White oak	3
15	4330	9"	Ash	1
16	4331	12"	Black cherry	2
17	4878	8"	Sugar maple	1
18	4909	10"	Hickory	1
19	4910	10"	Hickory	1
20	4911	8"	Sugar maple	1
21	4914	10"	Hickory	1
22	4915	8"	Hickory	1
23	4916	8"	Hickory	1
24	4917	8"	Basswood	1
25	4918	8"	Hickory	1
	<b>Total</b>	--	--	<b>32</b>

It should be noted that two (2) of the twenty-five remaining trees on the site have been determined to be dead and the removal of these 2 trees (Tree #4323 and #4324) has been authorized by the City Forester.

**Woodland Comments**

As noted above, ECT recommends that the applicant address the items below prior to issuance of building permits for construction on this lot:

1. **Per the City of Novi’s Woodland Ordinance, it should be noted that where a proposed activity (i.e., home construction) does not otherwise require site plan or plat approval, the granting or denying of the (woodland) use permit shall be the responsibility of the Planning Commission.**

**The applicant shall obtain approval of the Plan from Planning Commission prior to issuance of Building Permits.**

2. As noted above, the application does not indicate which of the existing twenty-five (25) trees the applicant would like to remove to build the pool. Based on the conceptual pool design provided with the application it appears as if approximately eleven (11) of the 25 existing trees are within the influence of the proposed

pool project (i.e., Trees #4274, #4275, #4321, #4322, #4323, #4324, #4878, #4909, #4910, #4911, and #4916). The applicant shall specifically clarify which trees are proposed for removal.

3. The applicant has clarified in phone conversations since the submittal of the Plan that the desire is to obtain approval to remove the remaining twenty (25) trees on the Lot. The applicant stated that they intend to provide a financial guarantee for removal of all of the remaining trees on the lot but will preserve trees if possible that are not within the influence of the construction of the pool and are not causing too much shading of the pool area. As such, the applicant would like to provide a financial guarantee for the removal of all of the remaining trees on the lot and request to be refunded at the end of the project.
4. The City of Novi regulates all trees 8-inches diameter-at-breast-height (DBH) and greater that are located within the areas delineated as regulated woodlands on the City-Regulated Woodlands Map. The City also regulates any individual tree greater than or equal to 36-inches DBH, irrespective of whether such tree is within a regulated woodland. Proposed woodland impacts will require a Woodland Permit and the regulated trees shall be relocated or replaced by the permit grantee.
5. As the removal of existing regulated trees is proposed, either on-site replacement trees or a payment of a fee to the City Tree Fund would be required prior to receiving building plan approval. This payment would amount to the number of Woodland Replacement Credits required x \$400/Credit. The City of Novi Woodland Ordinance requires tree replacement quantities according to the following table. **The Woodland Replacement Credits required for each tree removed should be indicated in the tree table on the Plan:**

**Replacement Tree Requirements**

Removed Tree DBH (In Inches)	Woodland Replacement Credits Required
$\geq 8 \leq 11$	1
$>11 \leq 20$	2
$> 20 \leq 29$	3
$\geq 30$	4

**The removal of all of the existing twenty-five (25) Regulated Woodland trees would require a total of thirty-two (32) Woodland Replacement Credits. The tree list information and proposed removal status of the trees shall be added to the Plan.**

6. Woodland Replacement Credits can be provided on-site or paid into the City of Novi Tree Fund at \$400/Woodland Replacement Credit. The Applicant shall be required to provide a financial guarantee for any required on-site Woodland Replacement tree credits. The Woodland Performance Financial Guarantee required for all **on-site** tree replacements shall be the **Number of On-Site Woodland Replacements Required x \$400/Credit**. This Woodland Performance Financial Guarantee shall be paid by the Applicant prior to issuance of Building Permits. Currently, the Plan does not indicate any proposed on-site Woodland Replacement trees.
7. On-site Woodland Replacement Trees shall be 2.5” caliper diameter if deciduous trees are selected and be 6-feet height (minimum) if coniferous trees are selected. The deciduous replacement trees count at a 1-to-1 replacement ratio and the coniferous trees (i.e. evergreen trees) count at a 1.5-to-1 replacement ratio (i.e.,

each evergreen tree is 0.67-credit). All Woodland Replacement trees shall be tree species native to Michigan and included as acceptable for Woodland Replacements on the *Woodland Tree Replacement Chart* (attached).

8. Any proposed on-site Woodland Replacement tree locations **shall be shown on the Plan** and replacement planting spacing shall be consistent with the City of Novi *Landscape Design Manual*. It should be noted that the replacement trees for existing deciduous canopy trees shall be spaced 22' (minimum distance) from one another, as noted in the *Landscape Design Manual*.
9. Upon successful inspection of installed replacement trees, the Woodland Performance Financial Guarantee shall be returned to the Applicant. At that time, a Woodland Maintenance Guarantee in the amount of 25% of the value of the original Woodland Replacement material will be kept for a period of 2-years after the successful inspection of the tree replacement installation. It should be noted that the minimum Woodland Maintenance Guarantee is **\$1,000** based on the City's Woodland Ordinance.
10. Should the applicant propose to removal all of the remaining twenty-five (25) trees on the lot and not elect to provide on-site Woodland Replacement trees, a non-refundable payment to the City of Novi Tree Fund will be required. If all 25 trees are removed the required payment would be **\$12,800** (32 Woodland Replacement Tree Credits required x \$400/Credit).
11. ECT suggests that tree protection fencing be provided in order to protect existing on-site trees to remain, if applicable. The Applicant should have Tree Protection Fence installed (in good condition) and installed in a manner that protects all trees that are to remain on site. It is the Applicant's responsibility to ensure that the fence remains in good condition. The tree protection fencing should be installed outside of the Critical Root Zone (CRZ) of all trees to remain. The CRZ is defined as a circular area around a tree with a radius measured to the tree's longest dripline radius plus one (1) foot. Dripline is defined as an imaginary vertical line that extends downward from the outermost tips of the branches to the ground. The location of Tree Protection Fence shall be shown on the Plan.
12. The Applicant shall pay a **\$750 (\$500 x 1.5) Woodland Protection Fence Maintenance Guarantee** prior to receiving building plan approval.

Please revise and resubmit the Plan to the City of Novi after addressing these comments. Please contact our office if you have any further questions regarding woodland-related issues.

Sincerely,

**ENVIRONMENTAL CONSULTING & TECHNOLOGY, INC.**

cc: Christian Carroll, City of Novi Planner ([ccarroll@cityofnovi.org](mailto:ccarroll@cityofnovi.org))  
Heather Gendron, Spalding DeDecker Associates, Inc. ([HGendron@sda-eng.com](mailto:HGendron@sda-eng.com))  
Barb McBeth, City Planner ([bmcbeth@cityofnovi.org](mailto:bmcbeth@cityofnovi.org))  
Rick Meader, City of Novi Landscape Architect ([rmeader@cityofnovi.org](mailto:rmeader@cityofnovi.org))  
Keith Salowich, City of Novi Forester ([ksalowich@cityofnovi.org](mailto:ksalowich@cityofnovi.org))  
Angela Sosnowski, City of Novi Community Development Bond Coordinator  
[asosnowski@cityofnovi.org](mailto:asosnowski@cityofnovi.org))  
Bashar Yalldo ([Byalldo@gmail.com](mailto:Byalldo@gmail.com))

Attachments: Woodland Tree Replacement Chart  
Figure 1. Plot Plan (PBR18-0445)  
Figure 2. Conceptual Pool Plan

### Woodland Tree Replacement Chart

(from Chapter 37 Woodlands Protection) - Revised 5/7/2018  
 (All canopy trees to be 2.5" cal or larger, evergreens as listed)

Common Name	Botanical Name
Black Maple	Acer nigrum
Striped Maple	Acer pennsylvanicum
Red Maple	Acer rubrum
Sugar Maple	Acer saccharum
Mountain Maple	Acer spicatum
Ohio Buckeye	Aesculus glabra
Downy Serviceberry	Amelanchier arborea
Smooth Shadbush	Amelanchier laevis
Yellow Birch	Betula alleghaniensis
Paper Birch	Betula papyrifera
American Hornbeam	Carpinus caroliniana
Bitternut Hickory	Carya cordiformis
Pignut Hickory	Carya glabra
Shagbark Hickory	Carya ovata
Northern Hackberry	Celtis occidentalis
Eastern Redbud	Cercis canadensis
Pagoda Dogwood	Cornus alternifolia
Flowering Dogwood	Cornus florida
American Beech	Fagus grandifolia
Thornless Honeylocust	Gleditsia triacanthos inermis
Kentucky Coffeetree	Gymnocladus dioica
Walnut	Juglans nigra or Juglans cinerea
Eastern Larch	Larix laricina
Tuliptree	Liriodendron tulipifera
Tupelo	Nyssa sylvatica
American Hophornbeam	Ostrya virginiana
White Spruce_(1.5:1 ratio) (6' ht.)	Picea glauca
Black Spruce_(1.5:1 ratio) (6' ht.)	Picea mariana
Red Pine_(1.5:1 ratio) (6' ht.)	Pinus resinosa
White Pine_(1.5:1 ratio) (6' ht.)	Pinus strobus
American Sycamore	Platanus occidentalis
Black Cherry	Prunus serotina
White Oak	Quercus alba
Swamp White Oak	Quercus bicolor
Scarlet Oak	Quercus coccinea
Shingle Oak	Quercus imbricaria
Burr Oak	Quercus macrocarpa
Chinkapin Oak	Quercus muehlenbergii
Red Oak	Quercus rubra
Black Oak	Quercus velutina
American Basswood	Tilia americana





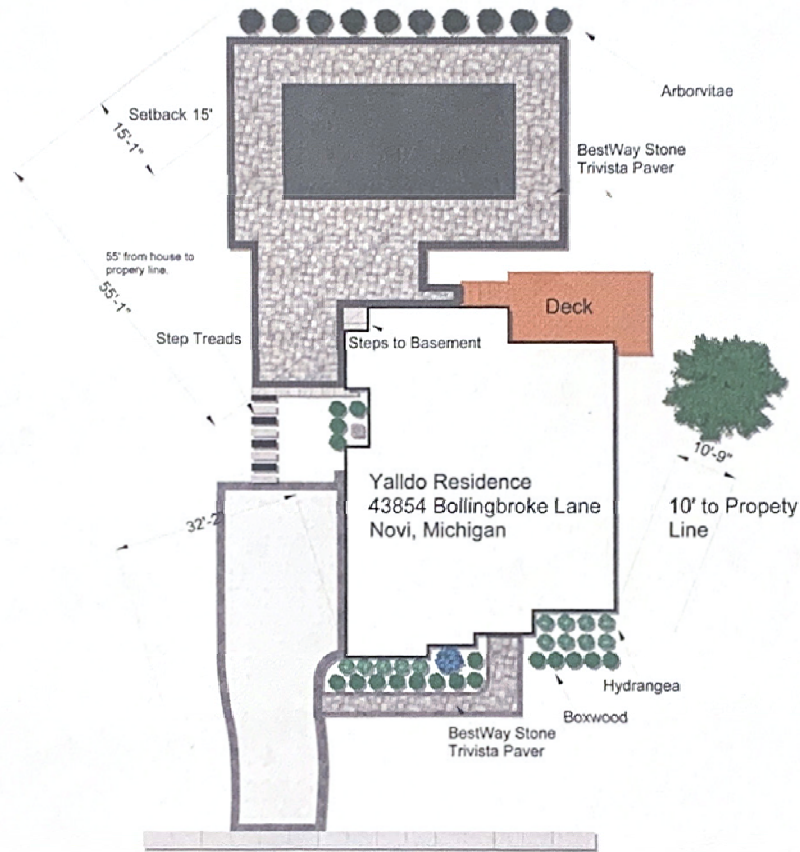


Figure 2. Conceptual Pool Plan.