

PUBLIC NOTICE

CITY OF BERKLEY, MICHIGAN REGULAR MEETING OF THE CITY PLANNING COMMISSION

Tuesday, March 18, 2025
7:00PM – City Hall Council Chambers
Information: 248-658-3320

CALL TO ORDER
PLEDGE OF ALLEGIANCE
ROLL CALL
APPROVAL OF AGENDA
APPROVAL OF MINUTES – *Meeting minutes of January 28, 2025*
COMMUNICATIONS
CITIZEN COMMENTS

OLD BUSINESS

NEW BUSINESS

1. **AMENDMENT TO PLANNED UNIT DEVELOPMENT PPUD-01-25: The Columbia:** The applicant, Krieger Klatt Architects on behalf of WJ Ventures LLC, 2465 Columbia, 2475 Columbia, 2468 Columbia and 2476 Columbia and 2475 Cambridge, is requesting an amendment to the Planned Unit Development previously approved for a multiple-family development on the east side of Coolidge Highway, south of Cambridge Road and north and south of Columbia Road
2. **Planning Commission Liaison for Chamber of Commerce**

LIAISON REPORTS
COMMISSIONER / STAFF COMMENTS
ADJOURN

Notice: Official Minutes of the City Planning Commission are stored and available for review at the office of the City Clerk. The City of Berkley will provide necessary reasonable auxiliary aids and services, such as signers for the hearing impaired and audio tapes of printed materials being considered at the meeting, to individuals with disabilities at the meeting upon four working days notice to the city. Individuals with disabilities requiring auxiliary aids or services should contact the city by writing or calling: City Clerk, ADA Contact, Berkley City Hall, 3338 Coolidge, Berkley, Michigan 48072, (248) 658-3300.

You can watch the meeting on Channel 10 for both Comcast and WOW, or at <http://www.youtube.com/CityofBerkley>.

THE REGULAR MEETING OF THE BERKLEY CITY PLANNING COMMISSION WAS CALLED TO ORDER AT 7:00 PM, JANUARY 28, 2025 AT BERKLEY CITY HALL BY CHAIR LISA KEMPNER.

The minutes from this meeting are in summary form capturing the actions taken on each agenda item. To view the meeting discussions in their entirety, this meeting is broadcasted on the city's government access channel, WBRK, every day at 9AM and 9PM. The video can also be seen, on-demand, on the city's YouTube channel: <https://www.youtube.com/user/cityofberkeley>

DRAFT

PRESENT: Josh Stapp Mike Woods
Shiloh Dahlin
Lisa Kempner
Eric Arnsman

ABSENT: Lisa Hamameh, Joe Bartus

ALSO PRESENT: Kristen Kapelanski, Community Development Director
Megan Masson-Minock, Planning Consultant

Motion by Commissioner Stapp to excuse the absences of Commissioner Hamameh and Commissioner Bartus.
Motion supported by Commissioner Woods.

Voice Vote to excuse the absences of Commissioner Hamameh and Commissioner Bartus.

AYES: 5
NAYS: 0
ABSENT: Hamameh, Bartus

MOTION CARRIED

APPROVAL OF AGENDA

Motion by Commissioner Dahlin to approve the agenda and supported by Commissioner Stapp.

Voice vote to approve the agenda

AYES: 5
NAYS: 0
ABSENT: Hamameh, Bartus

MOTION CARRIED

APPROVAL OF THE MINUTES

Motion by Commissioner Dahlin to approve the minutes of the December 17, 2024 regular Planning Commission meeting and supported by Commissioner Woods.

Voice vote to approve the meeting minutes of December 17, 2024.

AYES: 5
NAYS: 0
ABSENT: Hamameh, Bartus

MOTION CARRIED

COMMUNICATIONS

Community Development Director Kapelanski shared the latest issue of the Michigan Association of Planning Magazine.

CITIZEN COMMENTS

NONE

OLD BUSINESS

1. **Zoning Ordinance:** Consideration of an ordinance of the City of Berkley to repeal Chapter 94 Signs, repeal and replace Chapter 138, Zoning and repeal and replace the City of Berkley’s Zoning Map in order to move sign regulations to the Zoning Ordinance, match the recommendations of the Master Plan and modernize sign and zoning regulations.

Planning Consultant Masson-Minock presented the final draft of the Zoning Ordinance. She highlighted several items from the previous public hearing that have been incorporated to address Planning Commission’s comments.

The Planning Commission asked for the following additional corrections:

- The side yard setback definition should be adjusted to better match the diagram; and
- Formatting issues should be reviewed and corrected, as needed.

Motion by Commissioner Stapp and supported by Commissioner Dahlin to recommend approval of the draft zoning ordinance and to repeal Chapter 94 Signs, repeal and replace Chapter 138 Zoning and repeal and replace the City of Berkley’s Zoning map in order to move sign regulations to the Zoning Ordinance, match the recommendations of the Master Plan and modernize Sign and Zoning regulations.

Roll call vote on the motion recommending approval of the draft Zoning Ordinance and associated Code amendments.

AYES: 5

NAYS: 0

ABSENT: Hamameh, Bartus

NEW BUSINESS

1. **Subdivision Ordinance Discussion**

Planning Consultant Masson-Minock explained that the since this ordinance will be part of the City Code, the Planning Commission does not have jurisdiction but has been brought this item as a courtesy for discussion. She presented the ordinance and explained that Berkley was missing this ordinance in their City Code.

The Planning Commission did not have any comments on the proposed ordinance.

2. **PSP-01-25: 27333 – 27387 Woodward Ave.:** The applicant, The Jewish Community Center of Metropolitan Detroit, is requesting site plan approval for site plan revisions to a community center at 27333-27387 Woodward Ave. in the Woodward District, on the west side of Woodward Ave., between Columbia and Cambridge Rds.

Community Development Director Kapelanski presented the project noting that the applicant is requesting changes to a previously approved plan. She went through the changes, the most significant of which is the removal of the carry-out restaurant space, which brings the parking requirements into allowable margins per the ordinance. Previously, a parking waiver was required but this is no longer the case.

The applicant, Brian Siegal, along with his architect, John DeBruyne, thanked the staff for their assistance and went over the proposed changes.

The Planning Commission confirmed a shared parking agreement is no longer needed.

Motion by Commissioner Woods and supported by Commissioner Arnsman to approve the site plan for PSP-01-25: 27333-27387 Woodward Ave. with a finding that the plan meets the standards for site plan approval per Section 138-679 and the proposed landscaping meets the requirements of Section 130-37.

Roll call vote on the motion approving PSP-01-25.

AYES: 5

NAYS: 0

ABSENT: Hamameh, Bartus

3. **PSP-07-24: 2576 Coolidge Berkley BP:** The applicant, Jason Yaldo, is requesting site plan approval for site plan revisions to a gas station/convenience store at 2576 Coolidge in the Coolidge District, on the east side of Coolidge Hwy., south of Catalpa Ave.

Community Development Director Kapelanski presented the project, also changes to a previously approved plan. She went through the changes noted the main difference is the façade. The applicant is requesting a Planning Commission waiver for the reduced transparency on the Coolidge façade and the lack of a front door on the Coolidge façade.

The applicant, Jason Yaldo, explained the delays in the project and the proposed changes.

The Planning Commission discussed the project and asked the applicant (who agreed) to add additional transparency to the Catalpa façade to make up for the reduced transparency and lack of a door along Coolidge.

Motion by Commissioner Stapp and supported by Commissioner Dahlin to approve the site plan for PSP-07-24: 2576 Coolidge Hwy.

- With a finding that the Planning Commission is granting a waiver for the reduced transparency on the Coolidge façade and the lack of a door along Coolidge with the condition that the applicant increase the transparency on the Catalpa façade by either adding a third window and/or increasing the size of the existing windows;
- That the plan meets the standards for site plan approval per Section 138-679; and
- The proposed landscaping meets the requirements of Section 130-37.

Roll call vote on the motion approving PSP-07-24.

AYES: 5

NAYS: 0

ABSENT: Hamameh, Bartus

4. Planning Commission Bylaws and Rules of Procedure

Community Development Director Kapelanski stated this is the Planning Commission's annual review of their Bylaws and Rules of Procedure. Staff did not note any needed updates.

The Planning Commission noted their disapproval with having to excuse absent members and Community Development Director Kapelanski said she would pass that along. The Commission did not feel any changes to the Bylaws and Rules of Procedure were necessary.

LIAISON REPORT

Commissioners provided updates on the Chamber of Commerce, Downtown Development Authority and Zoning Board of Appeals.

City Council Member Patterson was absent and Community Development Director Kapelanski provided an update on the City Council activities.

COMMISSIONER COMMENTS

NONE

STAFF COMMENTS

NONE

ADJOURNMENT

Motion to adjourn by Commissioner Dahlin supported by Commissioner Woods.

Voice vote for adjournment

AYES: 5

NAYS: 0

ABSENT: Hamameh, Bartus

With no further business, the meeting was adjourned at 8:04 p.m.



CITY OF BERKLEY

COMMUNITY DEVELOPMENT

3338 COOLIDGE HWY, BERKLEY, MICHIGAN 48072

MEMORANDUM

To: Planning Commission

From: Kristen Kapelanski, Community Development Director

Subject: PPUD-01-25: The Columbia

Date: March 18, 2025

The applicant has submitted an amendment to the approved Planned Unit Development for The Columbia. The project history is detailed in the Community Development Department review memo.

Planning Unit Development Amendment Process:

A Planned Unit Development (PUD) is intended to offer an alternative to traditional development by permitting flexibility in the regulations for development while maintaining a consistent implementation of the goals and objectives of the City's Master Plan. Major amendments to the plan and any amendments necessitating alterations to or new ordinance deviations must follow the PUD approval process.

The Planning Commission is required to hold a public hearing and either recommend approval, recommend denial or postpone consideration of the PUD. Public hearing notices were sent via regular mail and posted in the newspaper in accordance with City and State requirements. Signs were also posted on the subject properties.

If/when the Planning Commission recommends approval or denial, the PUD proceeds to the City Council for their consideration. The applicant is obligated to construct the plan as shown in the approved PUD and as outlined in the PUD Agreement.

Plan Changes

A Planned Unit Development for this site was approved in 2024 by the City Council, after a positive recommendation from the Planning Commission. The applicant is proposing the following changes as part of the proposed amendment:

- The southern building has been eliminated and all units have been consolidated into one building on the northern-most parcel. The pocket park originally on the eastern half of the southern parcel has been moved to the west, fronting Coolidge. Carports are proposed as accessory structures on the southern parcel.
 - Conversion of the mansard roof into a flat deck roof. Height per the Zoning Ordinance is measured to the mid-point of a mansard roof and the top of a flat roof. In the original PUD, the top of the mansard roof was labeled as 45 ft. with a midpoint of 40 ft., the maximum allowed height. Since a flat top roof is measured differently, with a proposed height of 46 ft., this will require a
-

deviation. Parapets are also proposed for visual interest and screening. Those are not included in the overall height measurements. See the applicant's February 14, 2025 narrative for additional information.

- The first-floor lobby has been increased in size.
- The unit count has decreased from 57 to 51 units.
- Balcony locations have been added and adjusted.
- The façade has been updated to have similar materials but with a different color palate. Cement board siding has been added as an accent material on the east, north and south elevations. Siding can be permitted by the Planning Commission if the Commission finds that the standards in Section 138-678 have been met.
- The parking lot layout has been revised and the number of parking spaces has been reduced from 77 to 69. With the reduction of units, this equals a ratio of 1.35 spaces per unit. The current approved plan also proposed 1.35 spaces per unit. The parking lot reconfigurations result in a more usable parking area without the use of tandem spaces.
- Landscaping throughout the site has been adjusted to accommodate the proposed layout changes.
- The refuse area has been moved under the podium of the building.

It is important to note that the items identified by the Planning Commission as public benefits in the previous iteration have not been significantly changed. The question posed to the Commission with this new submission is whether the requested deviations (which have been slightly altered) do not outweigh the previously recognized public benefits.

Deviations that are proposed as part of the PUD plan are listed below. New deviations are bolded. Revised deviations are italicized.

- Deficient use (Non-residential is not provided on the first floor.)
- ***Deficient use (The southernmost parcel contains a public park space/plaza and parking for the proposed multifamily building. Parking and a park are not permitted uses in the Gateway Zoning District.)***
- *Deficient front setback -west (10 ft. required, 0.5 ft. provided)*
- ***Deficient building height (40 ft. required, 46 ft. provided)***
- *Deficient number of parking spaces (102 required, 69 provided)*
- *Deficient number of compact car spaces (30% permitted, 35% proposed)*
- ***Deficient use (Accessory structure – carports- located on a parcel without a principal use.)***
- ***Deficient parking location (Off-street parking facilities must be located on the same parcel as the principal use. Parking proposed on southern parcel.)***

Staff and Consultant Reviews

City staff and consultants have thoroughly reviewed the plans and provided several comments for the applicant to address.

- ***Community Development Review***

The Community Development review includes a thorough analysis of the PUD standards for approval. Deviations from the Zoning Ordinance requirements are also noted.

The Carlisle Wortman review also lists several items that needed to be addressed including the completion of a photometric plan. The applicant has submitted the required photometric plan and it is included in the Planning Commission packets. Staff has reviewed the photometrics and confirmed they comply with ordinance requirements.

- ***Department of Public Works Review***

The Department of Public Works cited several items that would need to be addressed later in the process or by others. They have no concerns with the PUD plan amendment proceeding.

- ***Hubbell Roth and Clark Review***

HRC also noted items that would need to be addressed later in the process and recommends approval of the plan.

- ***Public Safety Review***

Public Safety had no concerns with the proposed plan amendments.

- ***PUD Agreement***

The existing PUD Agreement will be updated to include the plan amendments prior to the City Council meeting.

The Planning Commission is asked to hold the public hearing and either recommend denial or approval of the amendments to the PUD plan or postpone consideration to a future meeting. Approval or denial motions should include findings noting how the applicant meets or does not meet the required standards for PUD approval. Additionally, an approval motion should also include requested deviations from the ordinance and any conditions attached to approval.

The Columbia

2476 Columbia Rd. Berkley, MI 48072

KRIEGER KLATT
ARCHITECTS

400 E. Lincoln Ave. | Royal Oak, MI 48067
P: 248.414.9270 F: 248.414.9275
www.kriegerklatt.com

Client:

WJ Ventures, LLC
2060 Coolidge Hwy.
Berkley, MI
48072

Project:

The Columbia
2476 Columbia Rd.
Berkley, MI 48072

Owner

WJ Ventures, LLC
2060 Coolidge Hwy.
Berkley, MI 48072
P.248.246.7878

Architect

Krieger | Klatt Architects Inc.
400 E. Lincoln Ave.
Royal Oak, MI 48067
P.248.414.9270.
F.248.414.9275

Civil Engineer

Giffels Webster
1025 E. Maple, Suite 100
Birmingham, MI 48009
P.248.852.3100



PRELIMINARY NOT FOR CONSTRUCTION

Issued	Description	By
02.13.2025	Revised PUD	
03.13.2025	Revised PUD Rev #1	

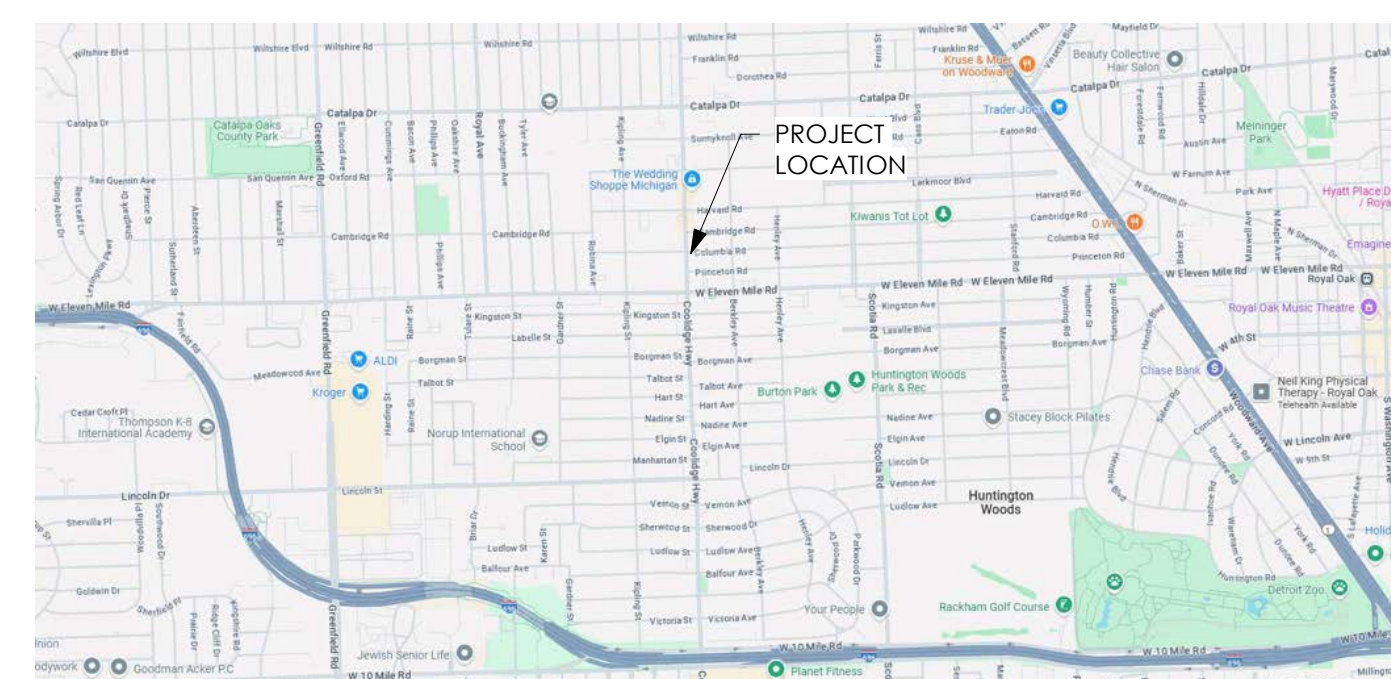
Seal:



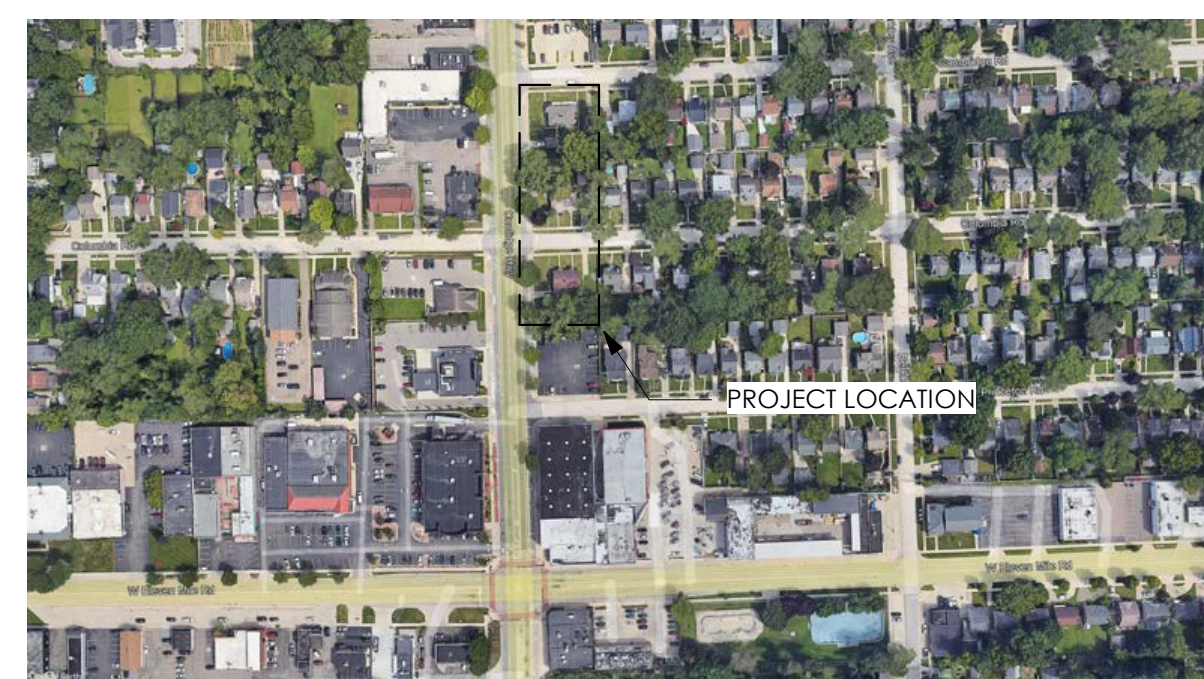
Note:

Do not scale drawings. Use calculated dimensions only. Verify existing conditions in field.

North Arrow:



North
Location Map
NTS



North
Aerial Map
NTS

Sheet No.	Title	02.14.2025 Revised PUD	03.13.2025 Revised PUD Rev # 1
C-200	Topographic & Boundary Survey	•	•
C-210	Schedule of Structures	•	•
C-300	Demolition Plan	•	•
C-600	Grading and Paving Plan	•	•
C-700	Utility Plan	•	•
C-720	Utility Calculations	•	•
LS-100	Landscape Plan	•	•
1 of 1	Photometric Plans & Details	•	•

Civil Sheet Index

Sheet No.	Title	02.14.2025 Revised PUD	03.13.2025 Revised PUD Rev # 1
G.001	Cover Sheet	•	•
G.002	Aerial Renderings	•	•
G.003	Perspective Renderings	•	•
A.100	First Floor Plan	•	•
A.101	Typical Floor Plan (Second - Third)	•	•
A.102	Fourth Floor Plan	•	•
A.103	Roof Plan	•	•
A.200	Elevations	•	•
A.201	Rendered Elevations	•	•
A.202	Carport Elevations	•	•
A.400	Building Sections	•	•

Architectural Sheet Index

Sheet Title:

Cover Sheet

Project Number:

Project Number

Scale:

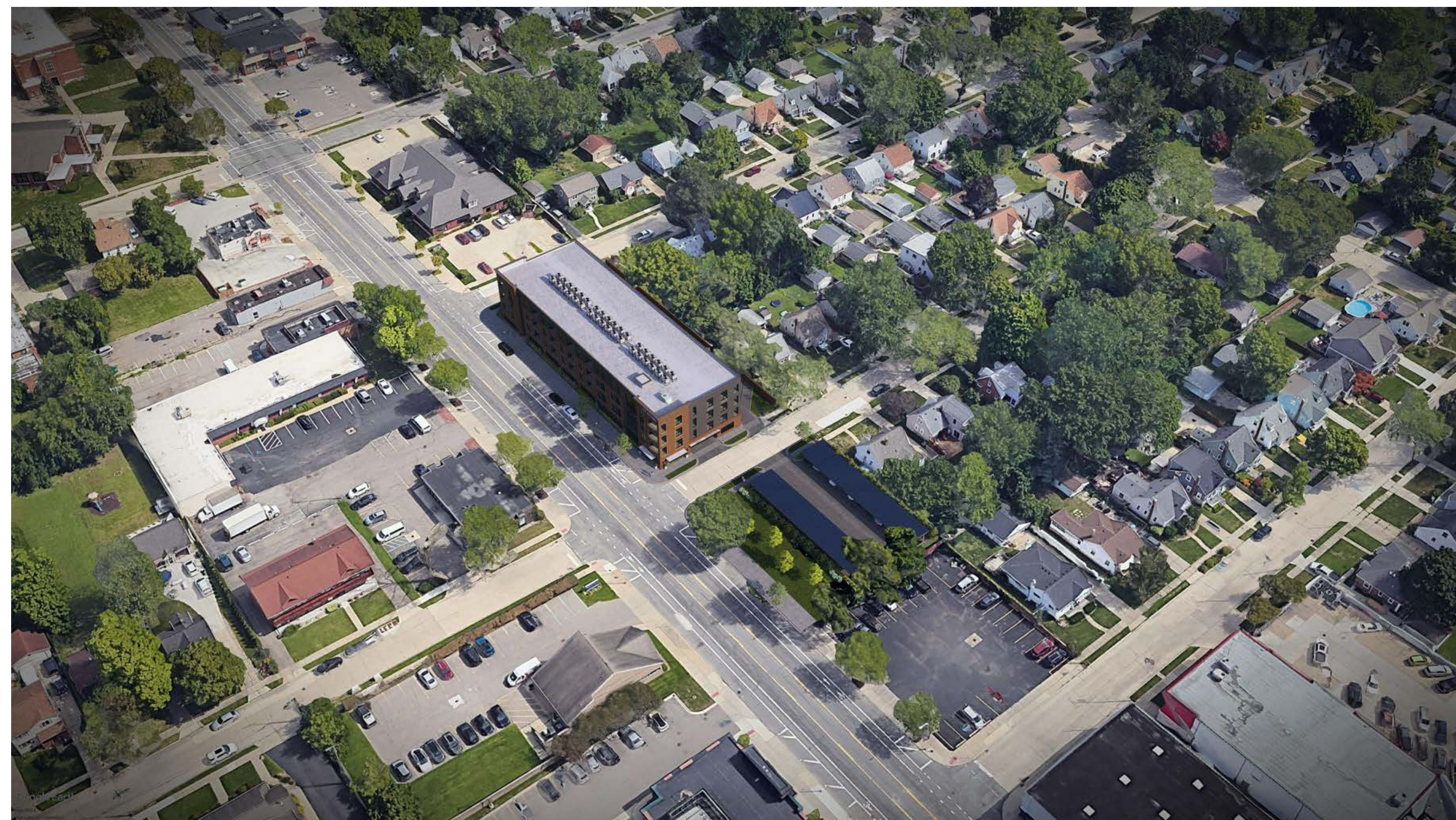
Sheet Number:

G.001

Client: _____
WJ Ventures, LLC
2060 Coolidge Hwy.

Project: _____
The Columbia
2476 Columbia Rd.
Berkley, MI 48072

Issued	Description	By
02.13.2025	Revised PUD	



Aerial Rendering looking Northeast



Aerial Rendering looking Southeast



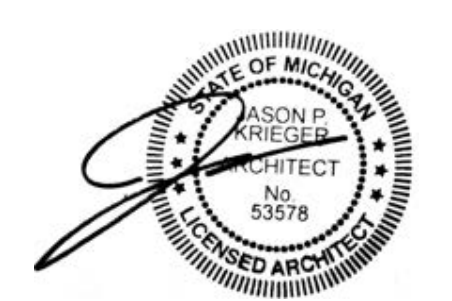
Aerial Rendering looking Southwest



Aerial Rendering looking Northwest

PRELIMINARY NOT FOR CONSTRUCTION

Seal: _____



Note: _____
Do not scale drawings. Use
calculated dimensions only.
Verify existing conditions in
field.
North Arrow: _____

Sheet Title: _____
Aerial Renderings

Project Number: _____
Project Number
Scale: _____

Sheet Number: _____
G.002

Client:
WJ Ventures, LLC
2060 Coolidge Hwy.

Project:
The Columbia
2476 Columbia Rd.
Berkley, MI 48072

Issued	Description	By
02.13.2025	Revised PUD	



Perspective Rendering at Northwest Corner



Perspective Rendering along Coolidge Hwy.



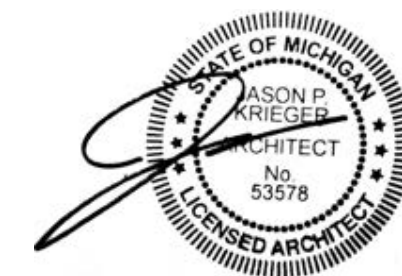
Perspective Rendering at Pocket Park



Perspective Rendering at Southwest Corner

PRELIMINARY NOT FOR CONSTRUCTION

Seal:



Note:
Do not scale drawings. Use calculated dimensions only.
Verify existing conditions in field.

North Arrow:

Sheet Title:
Perspective Renderings

Project Number:
Project Number

Scale:

Sheet Number:
G.003

LEGEND - EXISTING

SECTION LINE	⑤ SAN. MH	⊕ GAS METER	★ MISC. TOPO. FEATURE
E/ PAVEMENT	○ C.O. SAN. CLEAN OUT	⊕ SURVEY CONTROL POINT	△ SURVEY CONTROL POINT
CURB	△ SAN. RISER	⊕ GAS VALVE	● FOUND IRON
E/ GRAVEL	⊕ SAN. PUMP STATION	⊕ GAS MH	● FOUND NAIL
CL. ROAD	⊕ COMB. MH	⊕ TELE. RISER	⊕ F. CUT CROSS
E/ WALK	⊕ GATE VALVE	⊕ TELE. MH	⊕ SECTION COR.
RAILROAD	⊕ HYDRANT	⊕ TELE. CROSS BOX	⊕ FENCE POST
E/ BRICK	⊕ WATER VALVE	⊕ CABLE RISER	⊕ BENCHMARK
MISC. LINE	⊕ WATER METER	⊕ PAY PHONE	⊕ FOUND PIPE
FENCE	⊕ POST INDICATOR VALVE	⊕ MANHOLE	⊕ FOUND MON.
GUARD RAIL	⊕ WELL HEAD	⊕ SIGN	ASPH. ASPHALT
WALL	⊕ FDC CONNECTION	⊕ PROT. POST/GUARD POST	CONC. CONCRETE
BLDG. LINE	⊕ IRRIGATION CONTROL BOX	⊕ STORM MH	A.C. AIR CONDITIONER
OVERHEAD WRES	⊕ OVERHANG LINE	⊕ CATCH BASIN	G.P. GUARD POST
RAILING	⊕ T/ BANK	⊕ BEEHIVE CB	GUY
OVERHANG LINE	⊕ B/Y BANK	⊕ SHRUB LINE	C.L.F. CHAIN-LINK FENCE
IRRIGATION CONTROL BOX	⊕ CL. DITCH/STREAM	⊕ TREE LINE	D.L. DOOR LEDGE
OVERHANG LINE	⊕ SHRUB LINE	⊕ TREE LINE	F.F. FINISHED FLOOR
CATCH BASIN	⊕ ROOF/DOWN SPOUT	⊕ BLDG. CORNER (FIELD LOCATED)	O.H. OVERHANG
BEEHIVE CB	⊕ OVERFLOW/OUTLET STRUCTURE	⊕ HANDICAP PARKING	F.I. FOUND IRON
CULVERT E.S.	⊕ STORM CLEAN OUT	⊕ LIGHT POLE	S.I. SET IRON
ROOF/DOWN SPOUT	⊕ ROUND CB	⊕ UTILITY POLE	F.I.P. FOUND IRON PIPE
OVERFLOW/OUTLET STRUCTURE	⊕ SAN. LINE	⊕ ELEC. TRANS.	(M) MEASURED
STORM MH	⊕ WATER LINE	⊕ AIR CONDITIONER	(R) RECORD
WETLAND LINE	⊕ GAS LINE	⊕ ELEC. MH	F.M. FOUND MONUMENT
WETLAND LINE	⊕ UG ELEC. LINE	⊕ ELEC. METER	S.N. SET NAIL
STM	⊕ UG TELE. LINE	⊕ ELEC. RISER	CMP CORRUGATED METAL PIPE
SAN. LINE	⊕ CTV	⊕ TRAFFIC CONTROL BOX	RCR REINFORCED CONCRETE PIPE
WATER LINE	⊕ PAINT STRIPE	⊕ STEAM MH	G.L. GROUND LIGHT
GAS LINE	⊕ COMBINED SEWER	⊕ TELEPHONE OVERHEAD	L.S. LANDSCAPING
UG ELEC. LINE	⊕ PLD LINE		⊕ ENCROACHMENT
UG TELE. LINE	⊕ STEAM LINE		
CTV	⊕ TELEPHONE OVERHEAD		
PAINT STRIPE			
COMBINED SEWER			
PLD LINE			
STEAM LINE			
TELEPHONE OVERHEAD			

UTILITY STATEMENT

THE UNDERGROUND UTILITIES SHOWN HAVE BEEN LOCATED FROM FIELD SURVEY INFORMATION AND EXISTING DRAWINGS. THE SURVEYOR MAKES NO GUARANTEES THAT THE UNDERGROUND UTILITIES SHOWN COMPRISE ALL SUCH UTILITIES IN THE AREA, EITHER IN SERVICE OR ABANDONED. THE SURVEYOR FURTHER DOES NOT WARRANT THAT THE UNDERGROUND UTILITIES SHOWN ARE IN THE EXACT LOCATION INDICATED ALTHOUGH HE DOES CERTIFY THAT THEY ARE LOCATED AS ACCURATELY AS POSSIBLE FROM INFORMATION AVAILABLE.

(R) = UTILITY SHOWN FROM RECORDS OR PLANS, & FIELD LOCATED WHERE POSSIBLE.

PRIOR TO THE PLANNED BUILDING IMPROVEMENTS, AND/OR CONSTRUCTION, THE RESPECTIVE UTILITY COMPANIES MUST BE NOTIFIED TO STAKE THE PRECISE LOCATION OF THEIR UTILITIES.

BENCH MARK DATA

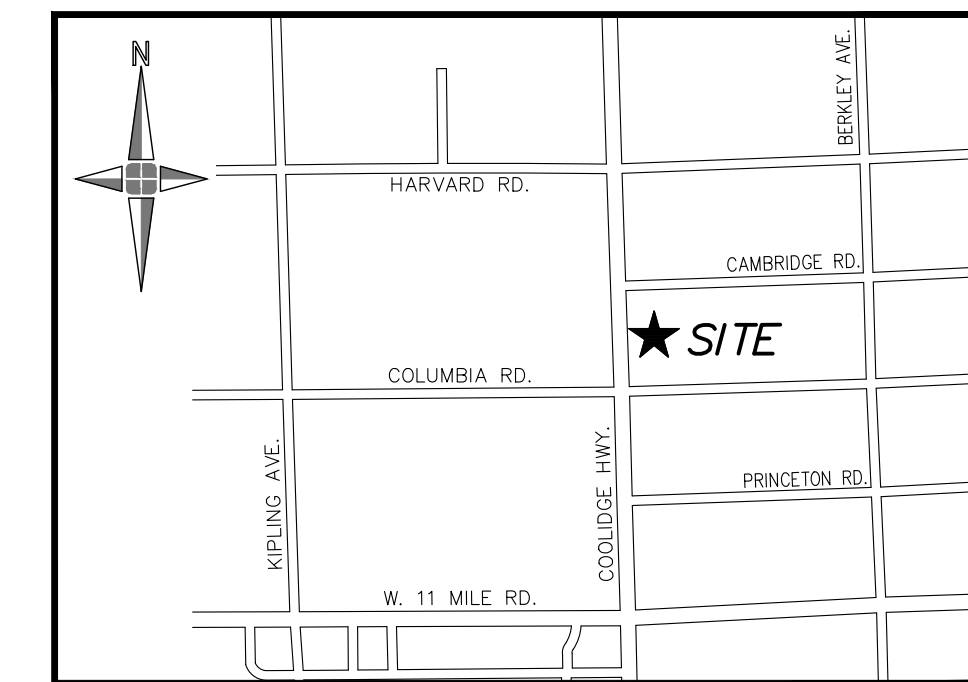
(NAVD83) DATUM WHICH DATUM? NOT LISTED ON BENCH LOOP

BENCH MARK 1
ARROW ON HYDRANT (1996), LOCATED ON THE WEST SIDE OF COOLIDGE HIGHWAY, +/- 3.5 FEET OFF OF THE BACK OF CURB, AND +/- 36 FEET SOUTH OF COLUMBIA ROAD.
ELEVATION=672.66'
(SHOWN GRAPHICALLY)

BENCH MARK 2
SE BOLT IN A LIGHT POLE BASE, LOCATED ON THE WEST SIDE OF COOLIDGE HIGHWAY, +/- 3 FEET OFF OF THE BACK OF CURB, AND +/- 150 FEET NORTH OF COLUMBIA ROAD.
ELEVATION=671.64'
(SHOWN GRAPHICALLY)

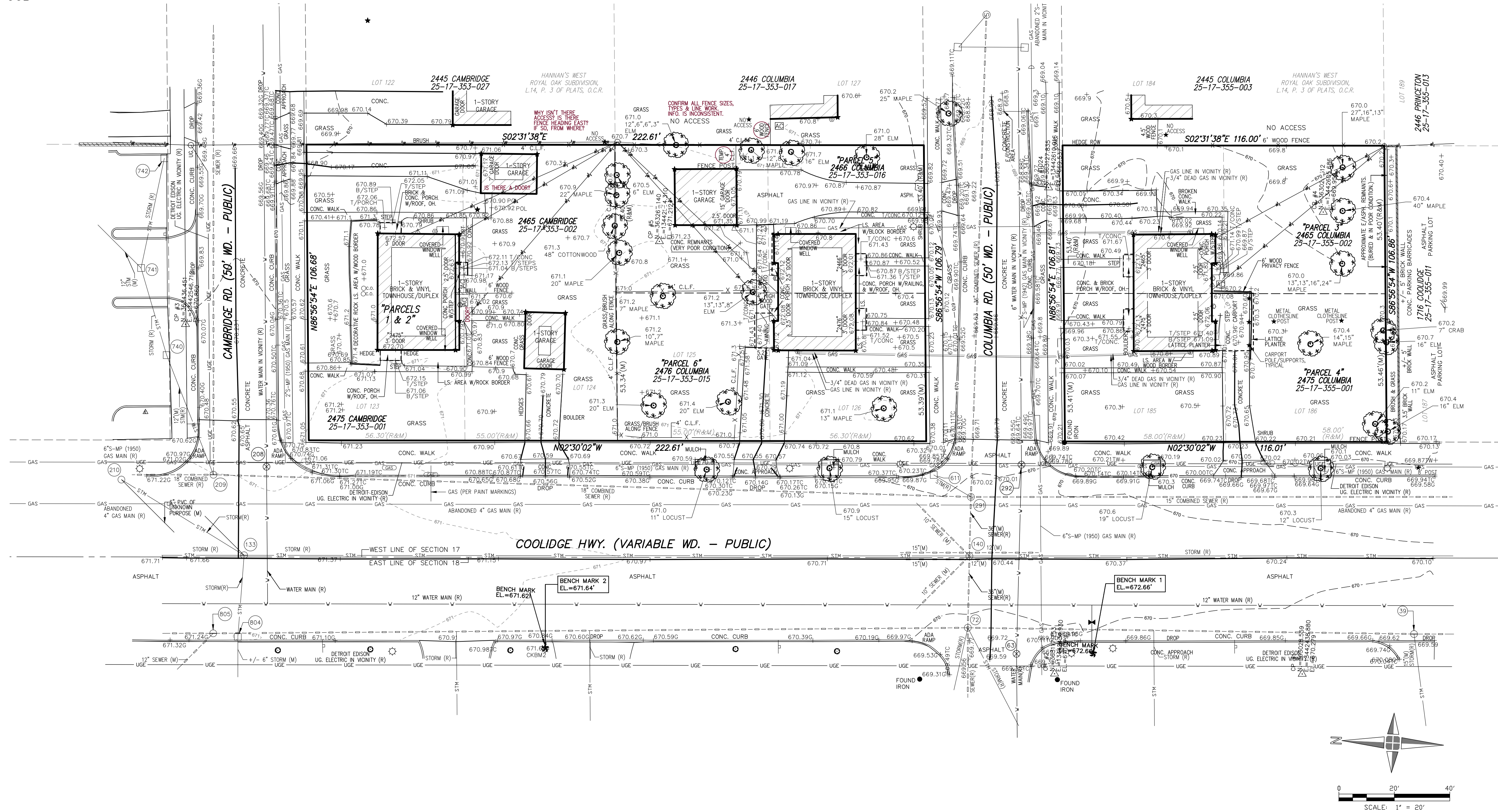
NOTES:

- SURVEY IN ACCORDANCE WITH TITLE COMMITMENT NO. 21223250-LP, ISSUED BY BELL TITLE AGENCY, DATED AUGUST 17, 2021
- TELEPHONE, CABLE TV, STEAM, AND PUBLIC LIGHTING UTILITY MAPS WERE NOT AVAILABLE AT TIME OF SURVEY.
- THE FOLLOWING WERE UTILIZED FOR THE REPRESENTATION OF CONDUIT, IN THIS DRAWING:
 - CONSUMERS ENERGY RECORD DRAWINGS.
 - GAS LEAD LOCATION SHOULD BE CONSIDERED AS APPROXIMATE. CONTACT MISS DIG TO LOCATE ALL CONDUIT, PRIOR TO CONSTRUCTION.
 - THE CITY OF BERKLEY WATER, SEWER, AND STORM RECORD DRAWING.
 - DUE TO THE SCHEMATIC NATURE OF THESE RECORDS, PRECISE LOCATION OF CONDUIT CANNOT BE DETERMINED. CONDUIT LOCATION, IN THIS DRAWING, SHOULD BE CONSIDERED AS APPROXIMATE. CONTACT MISS DIG TO LOCATE ALL CONDUIT, PRIOR TO ANY CONSTRUCTION.
 - OLDER DETROIT EDISON RECORD DRAWINGS.
 - AS THESE RECORD DRAWINGS ARE NOT CURRENT, CONDUIT MAY EXIST, ALTHOUGH NOT DEPICTED. IN ADDITION, DUE TO THE SCHEMATIC NATURE OF THESE RECORDS, PRECISE LOCATION CANNOT BE DETERMINED. CONDUIT LOCATION SHOULD BE CONSIDERED AS APPROXIMATE, WHERE NOT FIELD LOCATED. CONTACT MISS DIG TO LOCATE ALL CONDUIT, PRIOR TO ANY CONSTRUCTION.
 - OLDER LEVEL 3/CENTURY LINK RECORD DRAWING.
 - CONDUIT IS SHOWN, IN THIS RECORD, AS BEING OUTSIDE OF THE SCOPE OF THIS DRAWING. HOWEVER, AS THIS RECORD DRAWING IS NOT CURRENT, CONDUIT MAY EXIST, ALTHOUGH NOT DEPICTED. CONTACT MISS DIG TO LOCATE ALL CONDUIT, PRIOR TO ANY CONSTRUCTION.
 - MEASURED BEARINGS ARE BASED ON THE STATE PLANE COORDINATE SYSTEM, MICHIGAN SOUTH (2113), NAD83.
 - SEE SHEET 2 FOR STRUCTURE LIST.



LOCATION MAP
(NOT TO SCALE)

MISS DIG DESIGN TICKET NUMBER:
B012982740-00B



Engineers
Surveyors
Planners
Landscape Architects

1025 East Maple Road
Suite 100
Birmingham, MI 48009
p (248) 852-3100
f (313) 962-5068
www.giffelswebster.com

Executive: AW
Manager: JKA
Designer: JKA
Quality Control: AW
Section: 25
T-03-N R-10-E



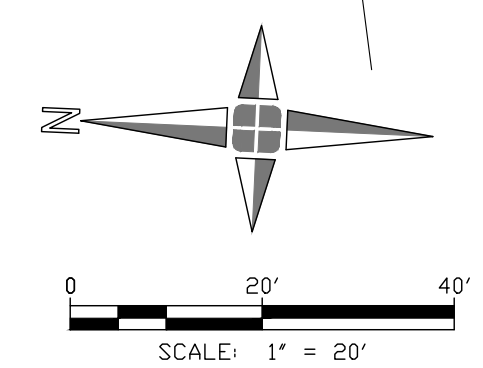
DATE:	ISSUE:
07.21.2023	Submit PUD to City
08.25.2023	Submit #2 PUD to City
08.23.2023	Submit #3 PUD to City
10.18.2023	Revised PUD to City
01.12.2024	ROW tree notes on Sht. LS-100
03.20.2024	Revised PUD
04.26.2024	Revised PUD
06.04.2024	Rev. per PC Conditions for Approval
02.14.2025	Revised Plans for PUD Amendment

Developed For:
WJ VENTURES, LLC
2060 COOLIDGE HWY
BERKLEY, MI 48072
248-246-7878

TOPOGRAPHIC & BOUNDARY SURVEY
THE COLUMBIA

CITY OF BERKLEY
OAKLAND COUNTY
MICHIGAN

Date: 07.21.2023
Scale: 1" = 20'
Sheet: C-200
Project: 20388.00



NOT FOR CONSTRUCTION

Copyright © 2021 Giffels Webster
No reproduction shall be made without the prior written consent of Giffels Webster.

Engineers
Surveyors
Planners
Landscape Architects

1025 East Maple Road
Suite 100
Birmingham, MI 48009
p (248) 852-3100
f (313) 962-5068
www.giffelswebster.com

Executive: AW
Manager: JKA
Designer: JKA
Quality Control: AW
Section: 25
T-03-N R-10-E

Professional Seal:



Know what's below.
Call before you dig.

DATE:	ISSUE:
07.21.2023	Submit PUD to City
08.25.2023	Submit #2 PUD to City
08.29.2023	Submit #5 PUD to City
10.18.2023	Revised PUD to City
01.12.2024	ROW tree notes on Sht. LS-100
03.20.2024	Revised PUD
04.26.2024	Revised PUD
06.04.2024	Rev. per PC Conditions for Approval
02.14.2025	Revised Plans for PUD Amendment

Developed For:

WJ VENTURES, LLC
2060 COOLIDGE HWY
BERKLEY, MI 48072
248-246-7878

SCHEDULE OF
STRUCTURES
THE COLUMBIA

CITY OF BERKLEY
OAKLAND COUNTY
MICHIGAN

Date: 07.21.2023
Scale: N/A
Sheet: C-210
Project: 20388.00

Copyright © 2021 Giffels Webster.
No reproduction shall be made without the
prior written consent of Giffels Webster.

SCHEDULE OF STRUCTURES

STRUCTURE	TYPE	SIZE OF PIPE	RIM	DROP	INVERT	DIRECTION	COMMENTS
39	STORM MANHOLE	CL. 15" CHANNEL	669.49	-12.23	657.26	NORTH & SOUTH. FLOWS NORTH.	
		15"	669.49	-7.14	662.35	WEST	
63	GATE VALVE	TVALVE	669.60	-3.48	666.12		
		18"	669.89	-13.50	656.39		
72	COMBINED MANHOLE	18"				NORTH	
		CL. 36" CHANNEL	669.89	-14.10	655.79	EAST & WEST. FLOWS EAST.	
		18"	669.89	-13.52	656.37	SOUTH	
		CL. 15" CHANNEL	671.51	-6.20	665.31	NORTH & SOUTH. FLOWS SOUTH.	
133	STORM MANHOLE	10"	671.51	-5.05	666.46	NORTHEAST	
		10"	671.51	-4.90	666.61	WEST	
		10"	670.46	-5.00	665.46	NORTHWEST	
		15"	670.46	-6.80	663.66	NORTH	
140	SANITARY MANHOLE	15"	670.46	-12.55	657.91	NORTH	
		10"	670.46	-5.30	665.16	NORTHEAST	
		CL. 36" CHANNEL	670.46	-14.90	655.56	EAST & WEST. FLOWS EAST.	
		12"	670.46	-6.60	663.86	SOUTH	
		12"	670.46	-12.20	658.26	SOUTH	
		12"	670.46	-4.05	666.79		
208	GATE VALVE	TVALVE	670.84	-4.05	666.79		
209	STORM MANHOLE	18"	671.01	-12.85	658.16	NORTH	
		12"	671.01	-9.60	661.41	EAST-NORTHEAST	
		18"	671.01	-12.25	658.76	EAST	
210	UNKNOWN MANHOLE	6" PVC	671.03	-3.77	667.26	SOUTHWEST	INVERT PLUS OR MINUS. HEAVILY OFFSET. NO OTHER PIPES VISIBLE. FULL OF WATER.
		18"	670.10	-13.85	656.25	NORTH	
291	SANITARY MANHOLE	12" PVC	670.10	-3.85	666.25	NORTHEAST	
		CL. 36" CHANNEL	670.10	-14.80	655.30	EAST & WEST	
		18"	670.10	-13.40	656.70	SOUTH	
		TWATER	669.74	-1.10	668.64		
292	GATE VALVE	TVALVE	669.74	-3.98	665.76		INVERT PLUS OR MINUS. UNABLE TO DEFINITELY DETERMINE TVALVE.
611	CATCH BASIN	12"	669.84	-3.32	666.52	SOUTHWEST	NO OTHER PIPES VISIBLE. FULL OF WATER.
740	CATCH BASIN	12"	670.33	-8.00	662.33	EAST-NORTHEAST	NO OTHER PIPES VISIBLE
		12"	670.31	-6.67	663.64	NORTHEAST	NO OTHER PIPES VISIBLE
741	CATCH BASIN	10"	670.31	-6.27	664.04	EAST	NO OTHER PIPES VISIBLE
		12"	670.31	-7.87	662.44	WEST-SOUTHWEST	NO OTHER PIPES VISIBLE
		10"	669.37	-3.78	665.59	WEST	24" DIAMETER STRUCTURE
742	CATCH BASIN	10"	670.97	-3.90	667.07	EAST. FLOWS EAST.	
		+/- 6"	670.97	-3.02	667.95	WEST	
804	CATCH BASIN	12"	671.14	-12.30	658.84	NORTHWEST	
		18" CHANNEL	671.14	-13.18	657.96	NORTH & SOUTH. FLOWS SOUTH.	

PROPERTY DESCRIPTION

(PER TITLE COMMITMENT NO. 21223250-LP, ISSUED BY BELL TITLE AGENCY, DATED AUGUST 17, 2021)
LAND IN THE CITY OF BERKLEY, COUNTY OF OAKLAND, MICHIGAN TO WIT:

PARCELS 1 AND 2:

LOTS 123 AND 124, EXCEPT THAT PORTION NOW INCLUDED IN COOLIDGE HIGHWAY, HANNAN'S WEST ROYAL OAK SUBDIVISION, ACCORDING TO THE PLAT THEREOF AS RECORDED IN LIBER 14 OF PLATS, PAGE 3, OAKLAND COUNTY RECORDS.
(TAX ID.: 25-17-353-001 - 2475 CAMBRIDGE)
(TAX ID.: 25-17-353-002 - 2465 CAMBRIDGE)

PARCEL 3:

EAST 53.4 FEET OF LOTS 185 AND 186, HANNAN'S WEST ROYAL OAK SUBDIVISION, AS RECORDED IN LIBER 14, PAGE 3 OF PLATS, OAKLAND COUNTY RECORDS
(TAX ID.: 25-17-355-002 - 2465 COLUMBIA)

PARCEL 4:

LOTS 185 AND 186, EXCEPT EAST 53.40 FEET OF EACH, ALSO EXCEPT WEST 10.19 FEET OF LOT 185 AND WEST 10.17 FEET OF LOT 186, HANNAN'S WEST ROYAL OAK SUBDIVISION, AS RECORDED IN LIBER 14, PAGE 3 OF PLATS, OAKLAND COUNTY RECORDS.
(TAX ID.: 25-17-355-001 - 2475 COLUMBIA)

PARCEL 5:

EAST 53.4 FEET OF LOTS 125 AND 126, HANNAN'S WEST ROYAL OAK SUBDIVISION, AS RECORDED IN LIBER 14, PAGE 3 OF PLATS, OAKLAND COUNTY RECORDS.
(TAX ID.: 25-17-353-016 - 2466 COLUMBIA)

PARCEL 6:

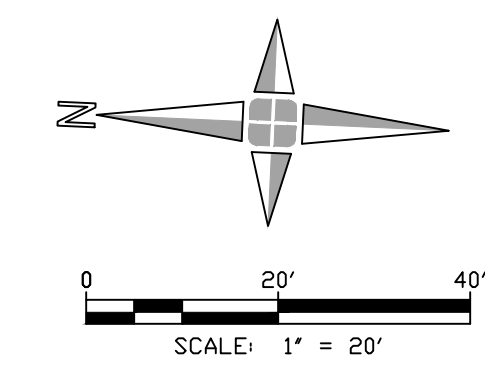
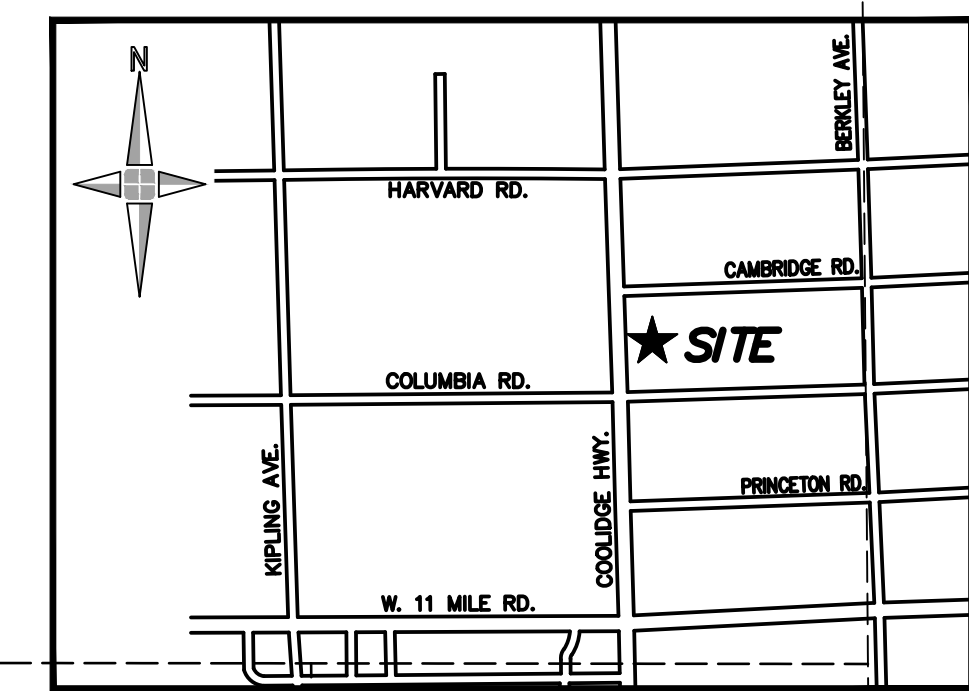
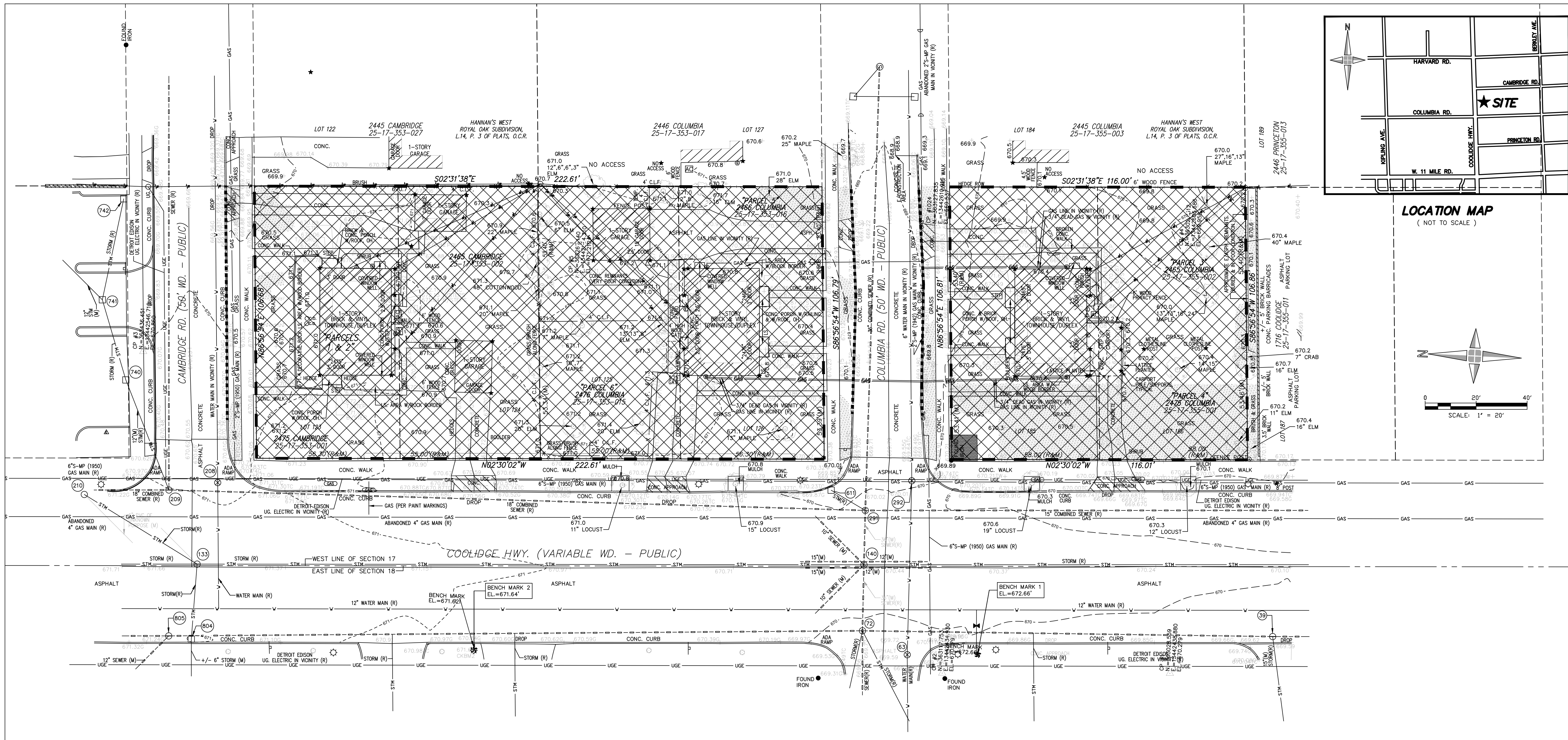
LOTS 125 AND 126, EXCEPT THE EAST 53.40 FEET OF EACH, ALSO EXCEPT WEST 10.25 FEET OF LOT 125, ALSO EXCEPT WEST 10.23 FEET OF LOT 126, HANNAN'S WEST ROYAL OAK SUBDIVISION, AS RECORDED IN LIBER 14, PAGE 3 OF PLATS, OAKLAND COUNTY RECORDS.
(TAX ID.: 25-17-353-015 - 2476 COLUMBIA)

SCHEDULE B - II. EXCEPTIONS

(PER TITLE COMMITMENT NO. 21223250-LP, ISSUED BY BELL TITLE AGENCY, DATED AUGUST 17, 2021)

NO SCHEDULE B - II. EXCEPTIONS, LISTED.

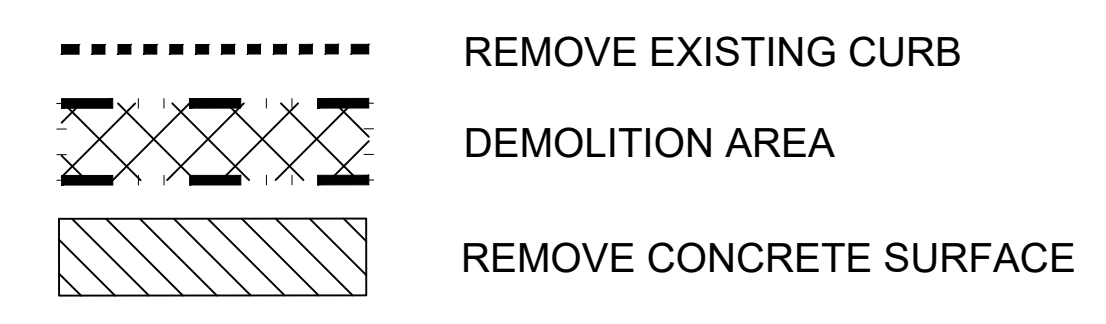
NOT FOR CONSTRUCTION



DEMOLITION NOTES:

- CONTRACTOR TO REMOVE ALL ITEMS WITHIN THE DEMOLITION AREAS.
- TREES TO BE CUT, REMOVED FROM SITE AND STUMPS REMOVED, NOT GROUND IN PLACE.
- BUILDINGS TO BE COMPLETELY REMOVED INCLUDING ALL FOUNDATIONS.
- CONTRACTOR TO COORDINATE WITH ALL UTILITY COMPANIES FOR PROPER SHUT OFF, DECOMMISSIONING, BULK-HEADING, ETC. OF ALL PUBLIC AND PRIVATE UTILITIES OR ARRANGE FOR REROUTING OF UTILITIES.
- CONTRACTOR TO WORK WITH CITY DPW FOR SHUTOFF, BULK-HEADING, AND ABANDONING OF ALL PUBLIC UTILITIES AND SERVICE LEADS.
- ALL REMOVED MATERIAL SHALL BE DISPOSED OF OFF SITE AND AT AN APPROVED FACILITY.
- MissDig Design Ticket Number B012982740-00B

DEMOLITION LEGEND:



Engineers
Surveyors
Planners
Landscape Architects

1025 East Maple Road
Suite 100
Birmingham, MI 48009
p (248) 852-3100
f (313) 962-5068
www.giffelswebster.com

Executive: AW
Manager: JKA
Designer: JKA
Quality Control: AW
Section: 25
T-03-N R-10-E



DATE	ISSUE
07.21.2023	Submit PUD to City
08.25.2023	Submit #2 PUD to City
08.29.2023	Submit #3 PUD to City
10.18.2023	Revised PUD to City
01.12.2024	ROW tree notes on Sht. LS-100
03.20.2024	Revised PUD
04.26.2024	Revised PUD
06.04.2024	Rev. per PC Conditions for Approval
02.14.2025	Revised Plans for PUD Amendment

Developed For:

WJ VENTURES, LLC

2060 COOLIDGE HWY
BERKLEY, MI 48072

248-246-7878

DEMOLITION PLAN

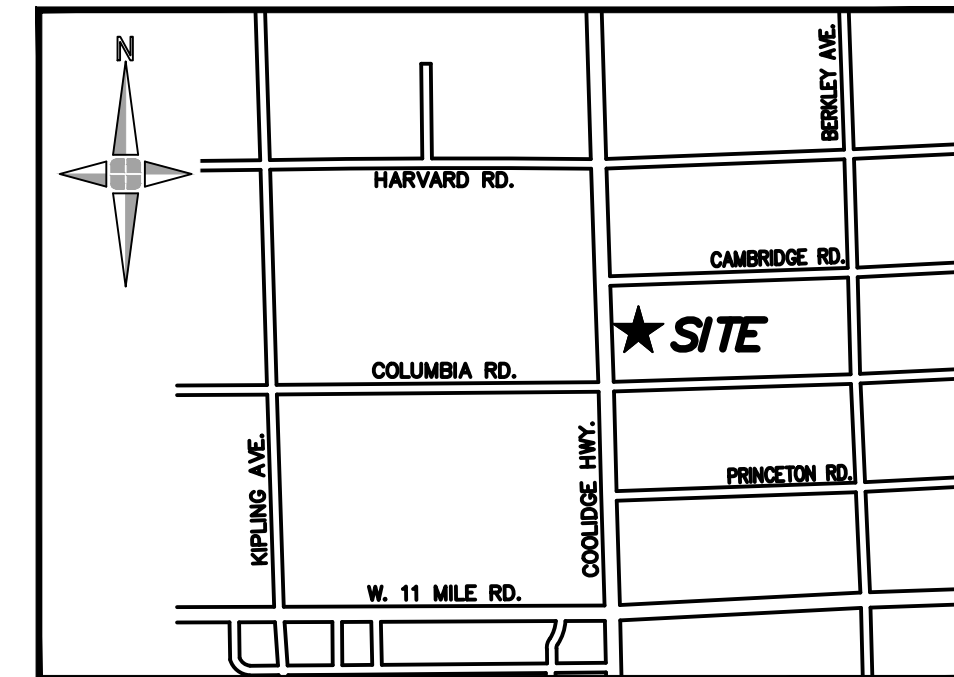
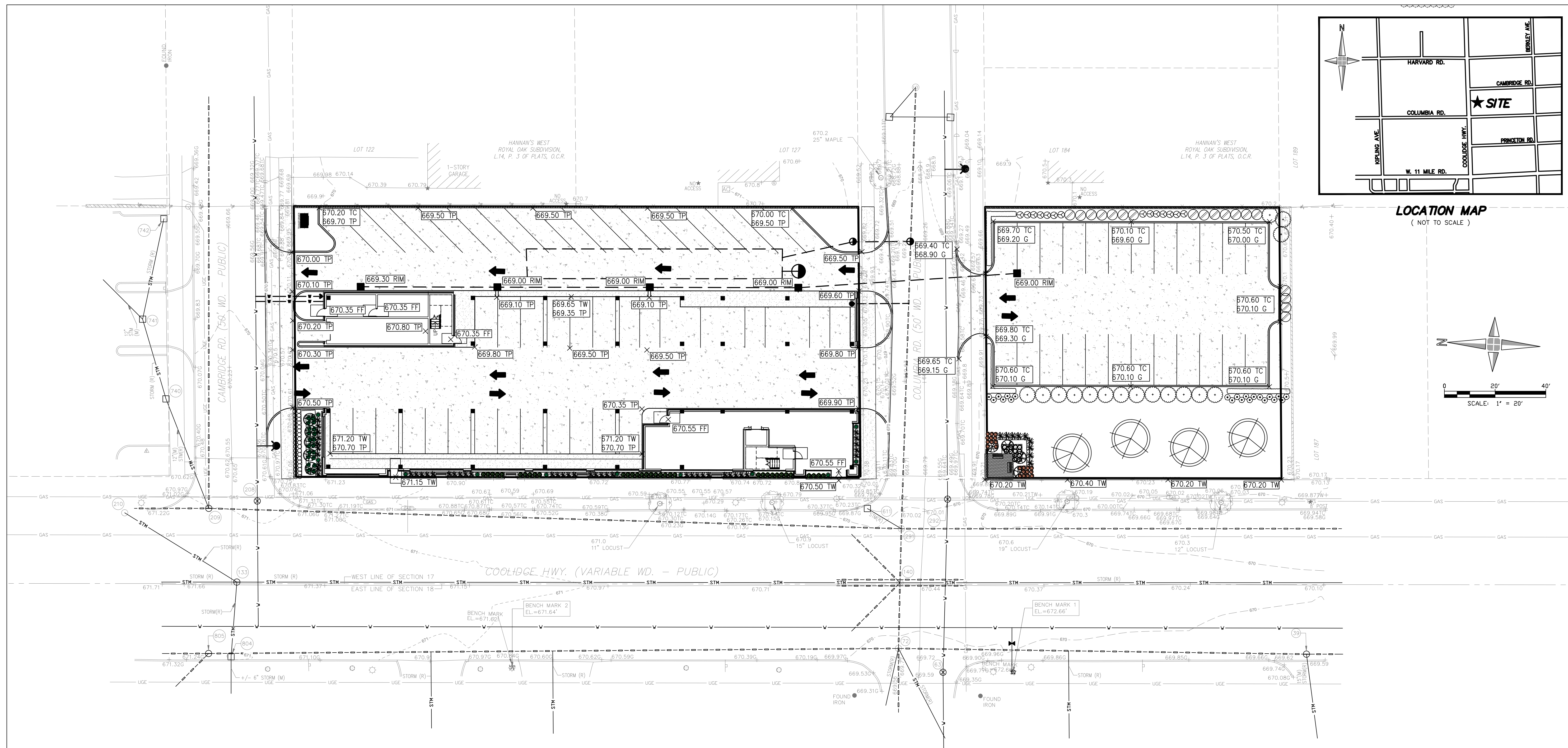
THE COLUMBIA

CITY OF BERKLEY
OAKLAND COUNTY
MICHIGAN

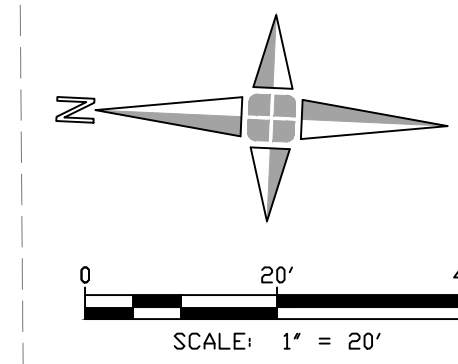
Date: 07.21.2023
Scale: 1" = 20'
Sheet: C-300
Project: 20388.00

NOT FOR CONSTRUCTION

H:\2020\30020388.00 Berkley_Lots\Design\CAD\Site Plan 01.24.2025\C-600 GRADING Berkley Condo SP REV.dwg



LOCATION MAP
(NOT TO SCALE)



LEGEND

- 670.00 TP PR TOP OF PAVEMENT ELEV.
- 670.00 FG PR FINISHED GRADE ELEV.
- PR 8" CONCRETE PAVEMENT
- PR 6" CONCRETE PAVEMENT
- PR 4" CONCRETE PAVEMENT

Engineers
Surveyors
Planners
Landscape Architects

1025 East Maple Road
Suite 100
Birmingham, MI 48009
p (248) 852-3100
f (313) 962-5068
www.giffelswebster.com

Executive: AW
Manager: JKA
Designer: JKA
Quality Control: AW
Section: 25
T-03-N R-10-E



Know what's below.
Call before you dig.

DATE:	ISSUE:
07.21.2023	Submit PUD to City
08.25.2023	Submit #2 PUD to City
08.29.2023	Submit #3 PUD to City
10.18.2023	Revised PUD to City
01.12.2024	ROW tree notes on Sht. LS-100
03.20.2024	Revised PUD
04.26.2024	Revised PUD
06.04.2024	Rev. per PC Conditions for Approval
02.14.2025	Revised Plans for PUD Amendment

Developed For:

WJ VENTURES, LLC

2060 COOLIDGE HWY
BERKLEY, MI 48072

248-246-7878

GRADING and PAVING PLAN

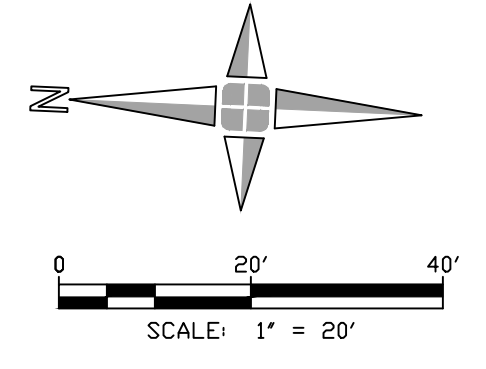
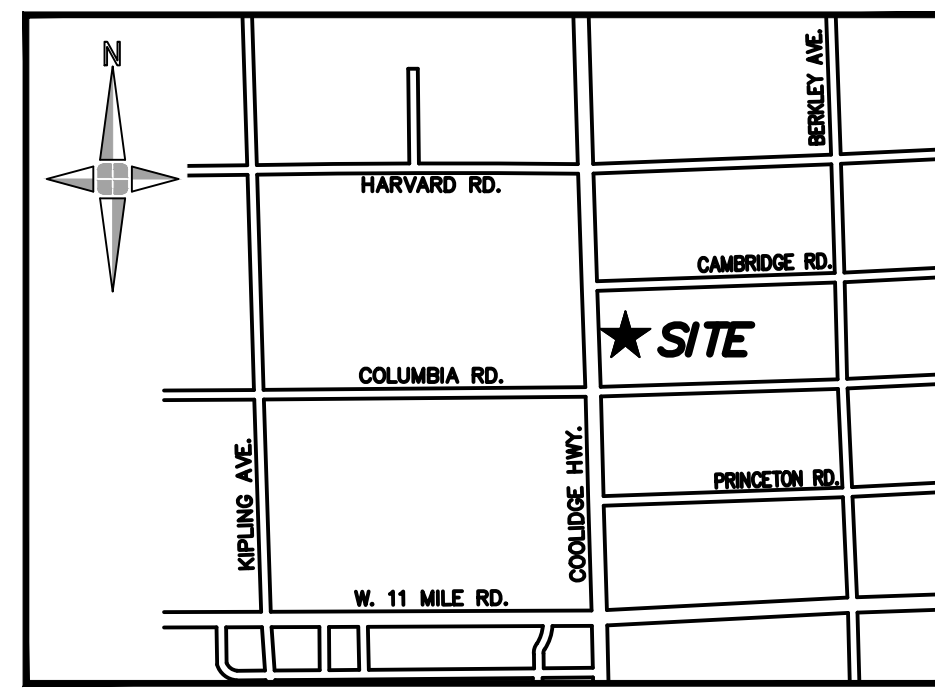
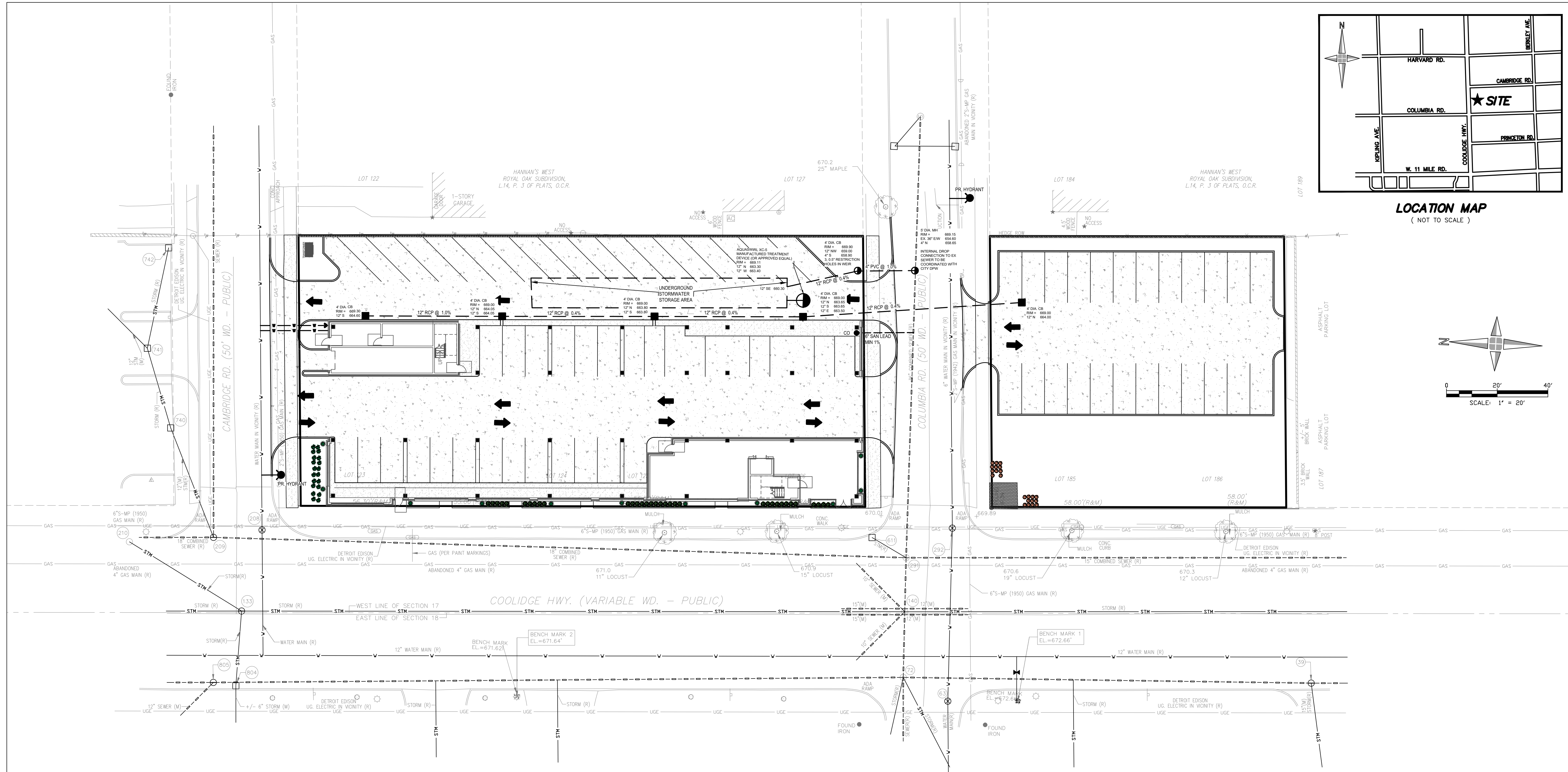
THE COLUMBIA

CITY OF BERKLEY
OAKLAND COUNTY
MICHIGAN

Date: 07.21.2023
Scale: 1" = 20'
Sheet: C-600
Project: 20388.00

NOT FOR CONSTRUCTION

Copyright © 2021 Giffels Webster. No reproduction shall be made without the prior written consent of Giffels Webster.



SITE CIVIL NOTES OF INTENT

- GRADING AND SESC: ALL GRADING AND SOIL EROSION & SEDIMENTATION CONTROL MEASURES WILL BE IMPLEMENTED AND STRICTLY ENFORCED THROUGHOUT CONSTRUCTION.
- SANITARY SERVICE: ALL EXISTING SANITARY SERVICES ARE PROPOSED TO BE ABANDONED VIA A SPOT LINER OR ANOTHER DPW APPROVED METHOD, WITHIN 2' OF THE MAIN. NEW SANITARY LEADS WILL BE INSTALLED AND CONNECTED WITH TWISTEE SEWER SADDLE PER DPW.
- WATER SERVICE: THE EXISTING WATER SERVICES WILL BE REMOVED TO THE CITY STOP BOXES OR PER DPW DIRECTION. A NEW DOMESTIC SERVICES WILL BE CONNECTED AND INSTALLED TO THE BUILDINGS. THE BUILDINGS WILL BE FIRE SUPPRESSED AND HAVE SEPARATE FIRE SERVICE LEADS INSTALLED.
- STREETS WILL BE RESTORED THAT ARE ASSOCIATED WITH UTILITY WORK.
- A TRAFFIC CONTROL PLAN WILL BE COORDINATED WITH CITY AND ADDED TO CONSTRUCTION PLANS FOR REVIEW AND APPROVAL.
- APPLICANT WILL COORDINATE / DISCUSS WITH CITY ON ANY ADDITIONAL UTILITY IMPROVEMENTS.
- ADDITIONAL FIRE HYDRANTS ARE PROPOSED TO PROVIDE APPROPRIATE FIRE COVERAGE.
- STORMWATER MANAGEMENT:
 - THE OAKLAND COUNTY WATER RESOURCES COMMISSIONER STORMWATER ENGINEERING DESIGN STANDARDS, UPDATED 11/22/2021, WILL BE FOLLOWED FOR PROPER DESIGN REQUIREMENTS. AND THE DESIGNED STORAGE WILL MEET OCWRC STANDARDS.
 - THIS SITE WILL ALSO UTILIZE A MECHANICAL TREATMENT DEVICE TO CAPTURE FLOATABLES AND FILTER OUT SEDIMENT. THIS UNIT WILL HAVE NPDES CERTIFICATION.
 - THE PROPOSED OUTLET CONTROL STRUCTURE WILL BE RESTRICTED AND DEWATER WITHIN ALLOWABLE TIMES.

STORMWATER SYSTEM NOTE:

STORMWATER MANAGEMENT SYSTEM WILL BE A PRIVATE SYSTEM UNDER THE MAINTENANCE OF THE PROPERTY OWNER. A MAINTENANCE AGREEMENT BETWEEN OWNER AND CITY OF BERKLEY WILL BE PROVIDED ONCE PLAN IS APPROVED. ALL NECESSARY EXHIBITS WILL BE INCLUDED WITH THE AGREEMENT.

LEGEND

- PR STORM SEWER
- PR STORM CATCH BASIN
- PR OUTLET CONTROL STRUCTURE
- PR MANUFACTURED TREATMENT DEVICE
- EX SANITARY LEAD
- EX WATER SERVICE
- FIRE HYDRANT

Engineers
 Surveyors
 Planners
 Landscape Architects

1025 East Maple Road
 Suite 100
 Birmingham, MI 48009
 p (248) 852-3100
 f (313) 962-5068
 www.giffelswebster.com

Executive: AW
 Manager: JKA
 Designer: JKA
 Quality Control: AW
 Section: 25
 T-03-N R-10-E



DATE:	ISSUE:
07.21.2023	Submit PUD to City
08.25.2023	Submit #2 PUD to City
08.29.2023	Submit #3 PUD to City
10.18.2023	Revised PUD to City
01.12.2024	ROW tree notes on Sht. LS-100
03.20.2024	Revised PUD
04.26.2024	Revised PUD
06.04.2024	Rev. per PC Conditions for Approval
02.14.2025	Revised Plans for PUD Amendment

Developed For:

WJ VENTURES, LLC

2060 COOLIDGE HWY
 BERKLEY, MI 48072

248-246-7878

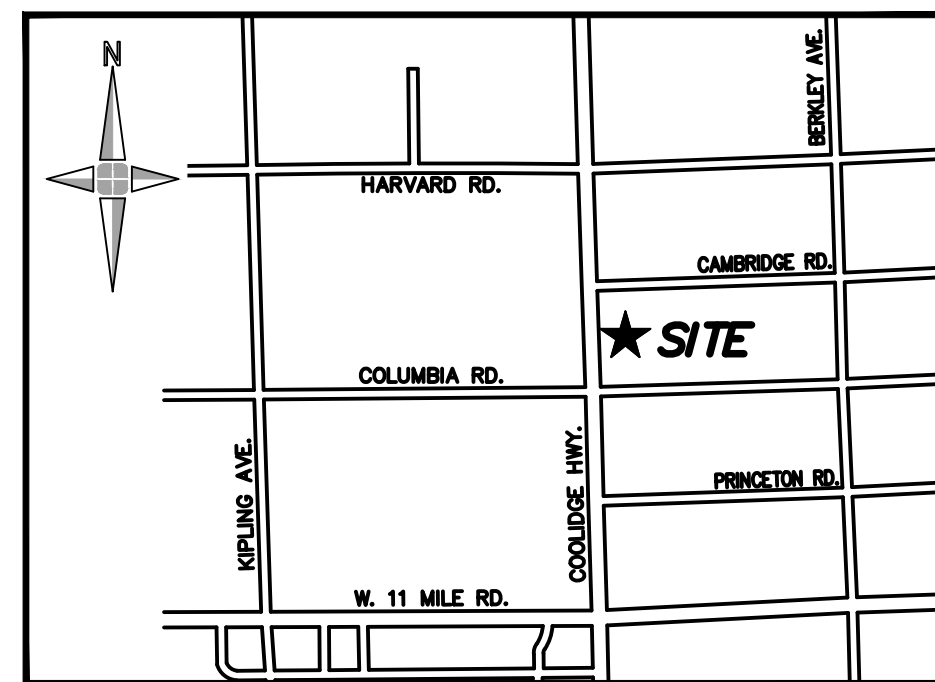
UTILITY PLAN

THE COLUMBIA

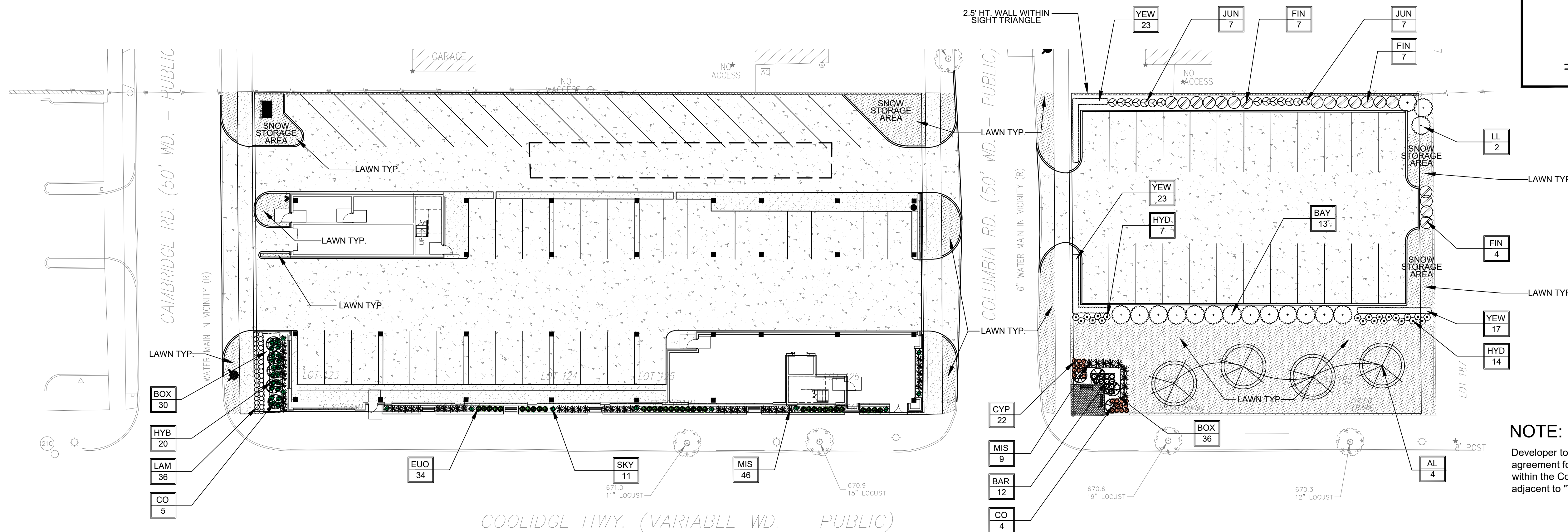
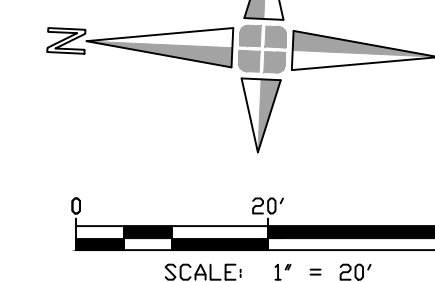
CITY OF BERKLEY
 OAKLAND COUNTY
 MICHIGAN

Date: 07.21.2023
 Scale: 1" = 20'
 Sheet: C-700
 Project: 20388.00

NOT FOR CONSTRUCTION



LOCATION MAP
(NOT TO SCALE)



NOTE:
Developer to provide a sum of money as referenced in the PUD agreement for the City of Berkeley to plant up to 6 new trees within the Coolidge Hwy ROW. These trees to be placed adjacent to "The Columbia" apartment development.

Engineers
Surveyors
Planners
Landscape Architects

1025 East Maple Road
Suite 100
Birmingham, MI 48009
p (248) 852-3100
f (313) 962-5068
www.giffelswebster.com

Executive: AW
Manager: JKA
Designer: JKA
Quality Control: AW
Section: 25
T-03-N R-10-E

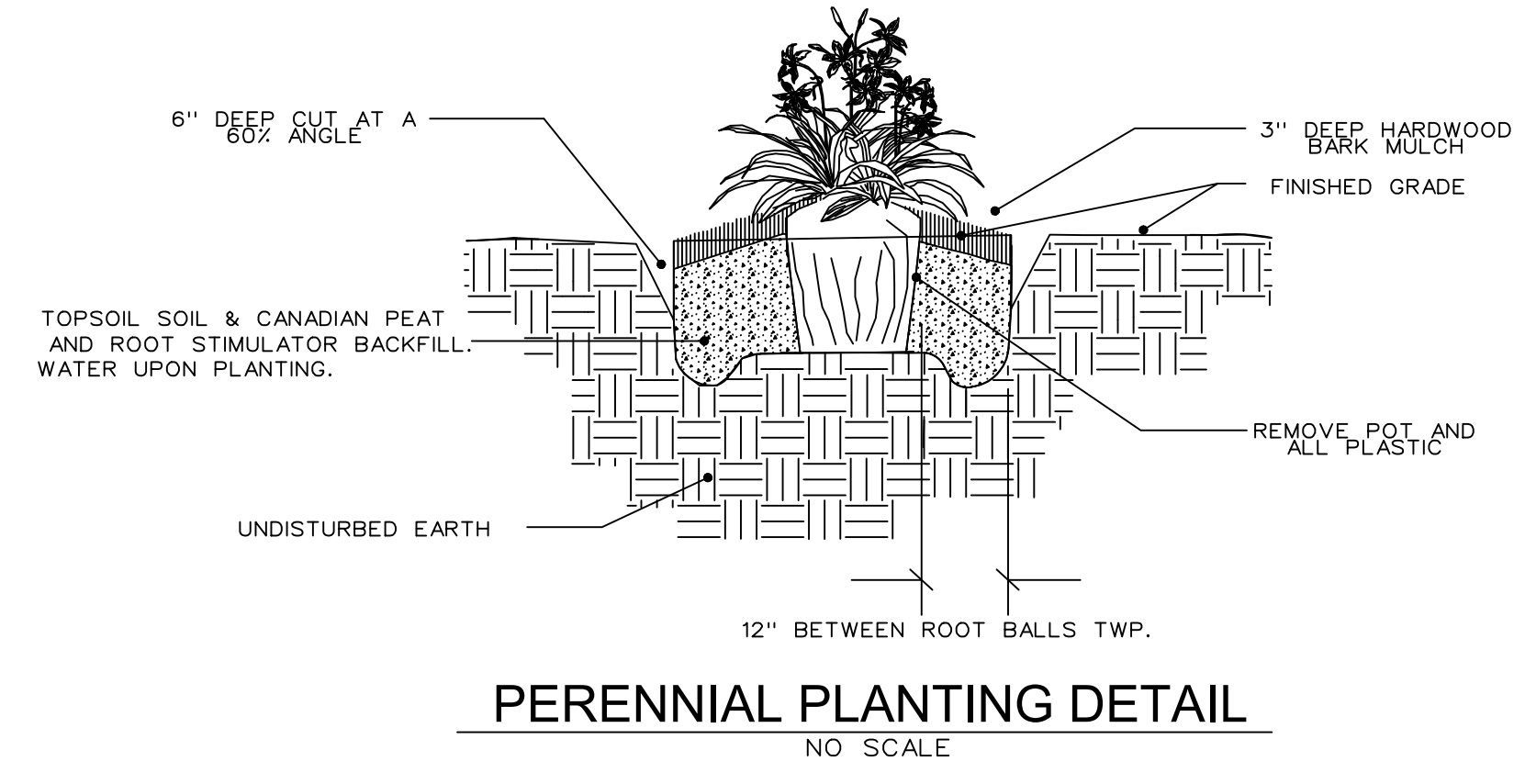


PLANT SCHEDULE

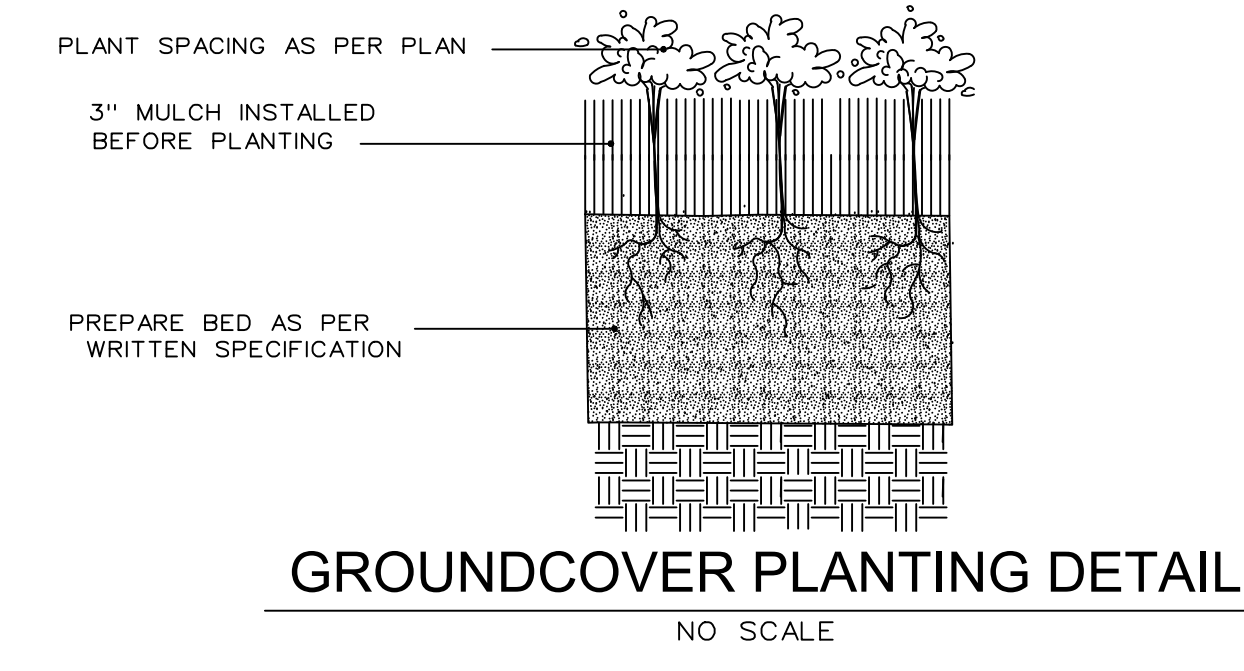
SYMBOL	ABBR	QUANTITY	BOTANICAL NAME	COMMON NAME	SIZE	NOTES
	CO	9	Quercus robur x crismocoidt	CRIMSON SPIRE OAK	3" cal.	B&B.
	AL	4	Tilia americana	AMERICAN LINDEN	3" cal.	B&B.
	BAY	13	Myrica pensylvanica	NORTHERN BAYBERRY	5 gal.	CONTAINER
	JUN	14	Juniperus chinensis 'blue point'	BLUE POINT JUNIPER	5 gal.	CONTAINER
	SKY	11	Juniperus scopulorum skyrocket	SKYROCKET JUNIPER	3 gal.	CONTAINER
	MIS	55	Miscanthus sinensis 'lille kitten'	LITTLE KITTEN MAIDEN GRASS	3 gal.	CONTAINER
	BOX	66	Buxus 'Green Velvet'	GREEN VELVET BOXWOOD	3 gal.	CONTAINER
	FIN	18	Rhamnus frangula 'on williams'	FINELINE BARBERRY	3 gal.	CONTAINER
	BAR	12	Thuja 'Degroot's Spire'	GOLDEN RUBY BARBERRY	1 gal.	CONTAINER
	YEW	63	Buxus 'Green Velvet'	GREEN VELVET BOXWOOD	5 gal.	CONTAINER
	CYP	22	Chamaecyparis pisifera f. 'mop'	MOPS THREADLEAF CYPRESS	1 GAL	CONTAINER
	HYD	21	Hydrangea paniculata 'smnhph'	LITTLE LIME PUNCH HYDRANGEA	3 gal.	CONTAINER
	HYB	20	Hydrangea quercifolia 'Mundkin'	MUNCHKIN OAKLEAF HYDRANGEA	3 gal.	CONTAINER
	EUO	34	Euonymus fortunei emerald'n gold	EMERALD 'N GOLD EUONYMUS.	1 gal.	CONTAINER
	LAM	36	Lamium maculatum 'orchid frost'	ORCHID FROST LAMIUM	1 gal.	CONTAINER

LAWN SEED MIX:

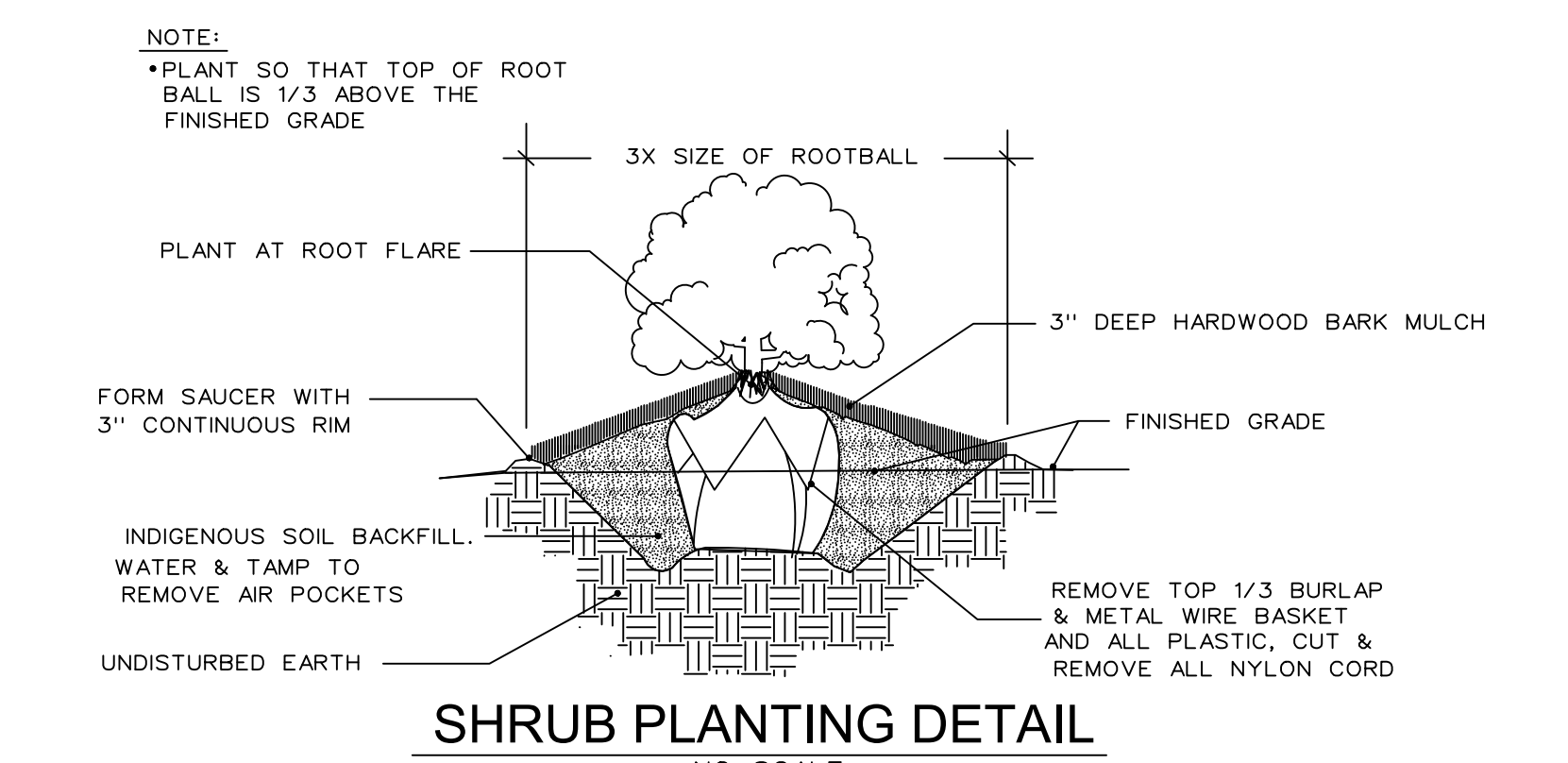
30% PERENNIAL RYGRASS
20% PARK KENTUCKY BLUEGRASS
45% CREEPING RED FESCUE
5% ANNUAL RYEGRASS
4*/1000 S.F. SEEDING RATE



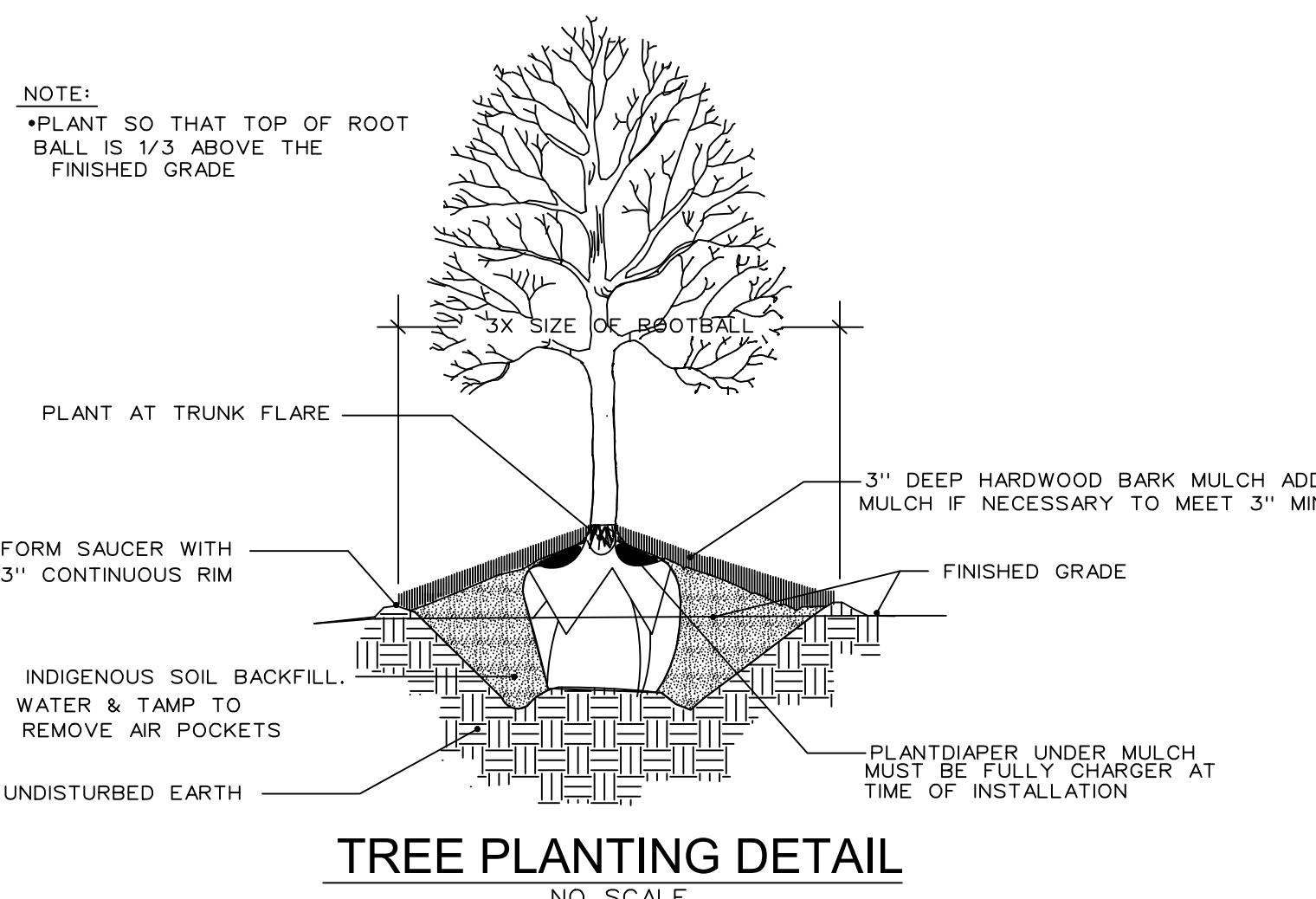
PERENNIAL PLANTING DETAIL
NO SCALE



GROUNDCOVER PLANTING DETAIL
NO SCALE



SHRUB PLANTING DETAIL
NO SCALE



TREE PLANTING DETAIL
NO SCALE

DATE	ISSUE
07.21.2023	Submit PUD to City
08.25.2023	Submit #2 PUD to City
08.29.2023	Submit #3 PUD to City
10.18.2023	Revised PUD to City
01.12.2024	ROW tree notes on Sht. LS-100
03.20.2024	Revised PUD
04.26.2024	Revised PUD
06.04.2024	Rev. per PC Conditions for Approval
02.14.2025	Revised Plans for PUD Amendment

Developed For:
WJ VENTURES, LLC

2060 COOLIDGE HWY
BERKLEY, MI 48072

248-246-7878

LANDSCAPE PLAN
THE COLUMBIA

CITY OF BERKLEY
OAKLAND COUNTY
MICHIGAN

Date: 07.21.2023
Scale: 1" = 20'
Sheet: LS-100
Project: 20388.00

NOT FOR CONSTRUCTION

Issued	Description	By
02.13.2025	Revised PUD	

Unit Schedule	
Name	Count
02 - Second Floor	
A1 - Studio	4
A2 - Studio	1
B1 - 1 Bedroom	8
B2 - 1 Bedroom	1
B2.1 - 1 Bedroom	1
B3 - 1 Bedroom	1
B3.1 - 1 Bedroom	1
17	
03 - Third Floor	
A1 - Studio	4
A2 - Studio	1
B1 - 1 Bedroom	8
B2 - 1 Bedroom	1
B2.1 - 1 Bedroom	1
B3 - 1 Bedroom	1
B3.1 - 1 Bedroom	1
17	
04 - Fourth Floor	
A1 - Studio	4
A2 - Studio	1
B1 - 1 Bedroom	8
B2 - 1 Bedroom	1
B2.1 - 1 Bedroom	1
B3 - 1 Bedroom	1
B3.1 - 1 Bedroom	1
17	
Total Units	51

Unit Percentage		
Occupancy	Count	Unit %
1 Bedroom	36	70.6%
Studio	15	29.4%
Total Units	51	

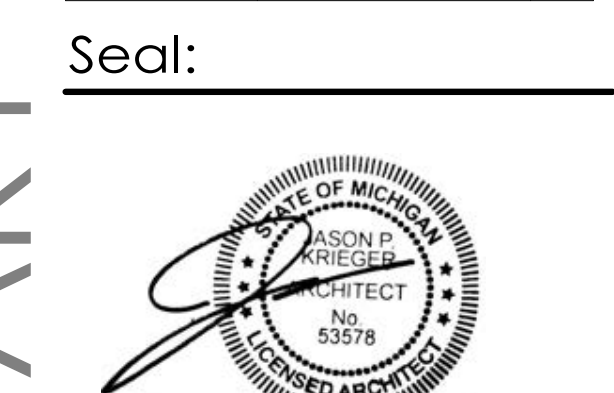
Unit SF	
Name	Area
Unit A1	423 SF
Unit A2	575 SF
Unit B1	739 SF
Unit B2	483 SF
Unit B2.1	483 SF
Unit B3	821 SF
Unit B3.1	701 SF

Gross Area	
Floor	Area
01 - First Floor	15172 SF
02 - Second Floor	14203 SF
03 - Third Floor	6801 SF
04 - Fourth Floor	6801 SF
	42977 SF

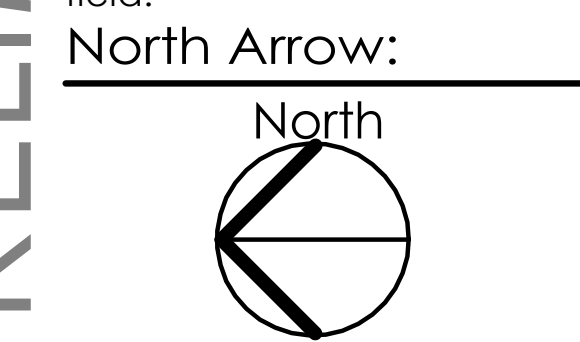
Resi. Net Area	
Floor	Area
02 - Second Floor	11785 SF
03 - Third Floor	4864 SF
04 - Fourth Floor	4864 SF
	21513 SF

Parking Schedule	
Count	Count
	69
	69

RATIO: 1.35 SPACES / UNIT



Note:
 Do not scale drawings. Use
 calculated dimensions only.
 Verify existing conditions in
 field.



Sheet Title:
 First Floor Plan

Project Number:

Project Number

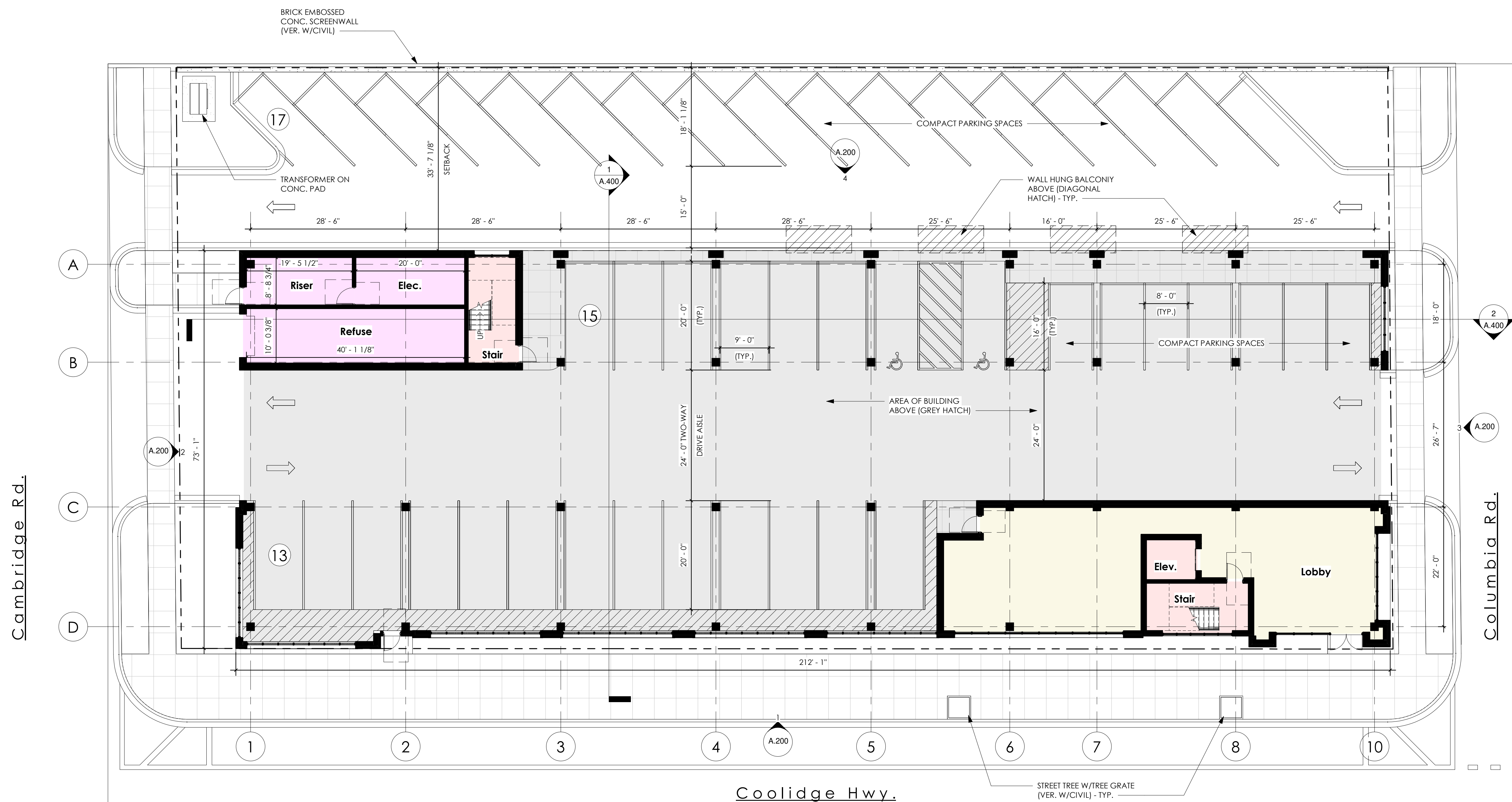
Scale:

3/32" = 1'-0"

Sheet Number:

A.100

PRELIMINARY NOT FOR CONSTRUCTION



First Floor Plan

3/32" = 1'-0"

Client:
WJ Ventures, LLC
2060 Coolidge Hwy, Berkley, MI
48072

Project:
The Columbia
2476 Columbia Rd.
Berkley, MI 48072

Issued	Description	By
02.13.2025	Revised PUD	



Fourth Floor Plan
3/32" = 1'-0"

Unit Schedule

Name	Count
02 - Second Floor	
A1 - Studio	4
A2 - Studio	1
B1 - 1 Bedroom	8
B2 - 1 Bedroom	1
B2.1 - 1 Bedroom	1
B3 - 1 Bedroom	1
B3.1 - 1 Bedroom	1
17	
03 - Third Floor	
A1 - Studio	4
A2 - Studio	1
B1 - 1 Bedroom	8
B2 - 1 Bedroom	1
B2.1 - 1 Bedroom	1
B3 - 1 Bedroom	1
B3.1 - 1 Bedroom	1
17	
04 - Fourth Floor	
A1 - Studio	4
A2 - Studio	1
B1 - 1 Bedroom	8
B2 - 1 Bedroom	1
B2.1 - 1 Bedroom	1
B3 - 1 Bedroom	1
B3.1 - 1 Bedroom	1
17	
Total Units	51

Unit Percentage

Occupancy	Count	Unit %
1 Bedroom	36	70.6%
Studio	15	29.4%
Total Units	51	

Unit SF

Name	Area
Unit A1	623 SF
Unit A2	575 SF
Unit B1	739 SF
Unit B2	683 SF
Unit B2.1	683 SF
Unit B3	821 SF
Unit B3.1	701 SF

Gross Area

Floor	Area
01 - First Floor	15172 SF
02 - Second Floor	14203 SF
03 - Third Floor	6801 SF
04 - Fourth Floor	6801 SF
	42977 SF

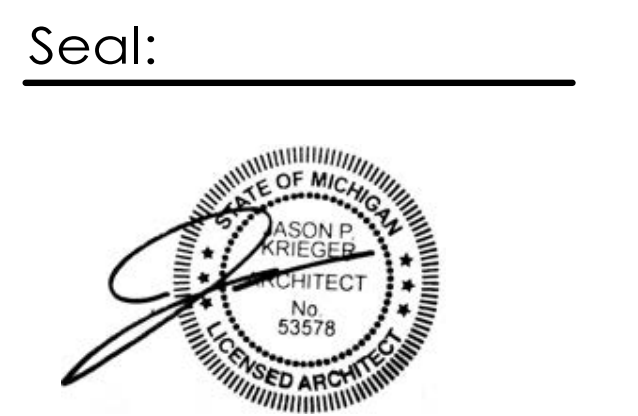
Resi. Net Area

Floor	Area
02 - Second Floor	11785 SF
03 - Third Floor	4864 SF
04 - Fourth Floor	4864 SF
	21513 SF

Parking Schedule

Count	Total
	69
	69

RATIO: 1.35 SPACES / UNIT



Note:
Do not scale drawings. Use calculated dimensions only. Verify existing conditions in field.

North Arrow:

Sheet Title:
Fourth Floor Plan

Project Number:
Project Number

Scale:
3/32" = 1'-0"

Sheet Number:
A.102

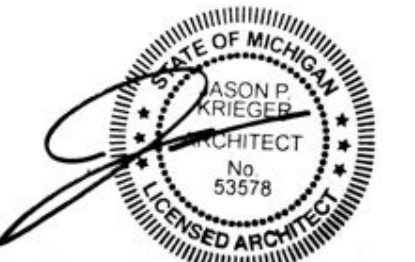
PRELIMINARY NOT FOR CONSTRUCTION

Client: _____
 WJ Ventures, LLC

Project: _____
 The Columbia
 2476 Columbia Rd.
 Berkley, MI 48072

Issued	Description	By

Seal: _____



Note: Do not scale drawings. Use calculated dimensions only. Verify existing conditions in field.

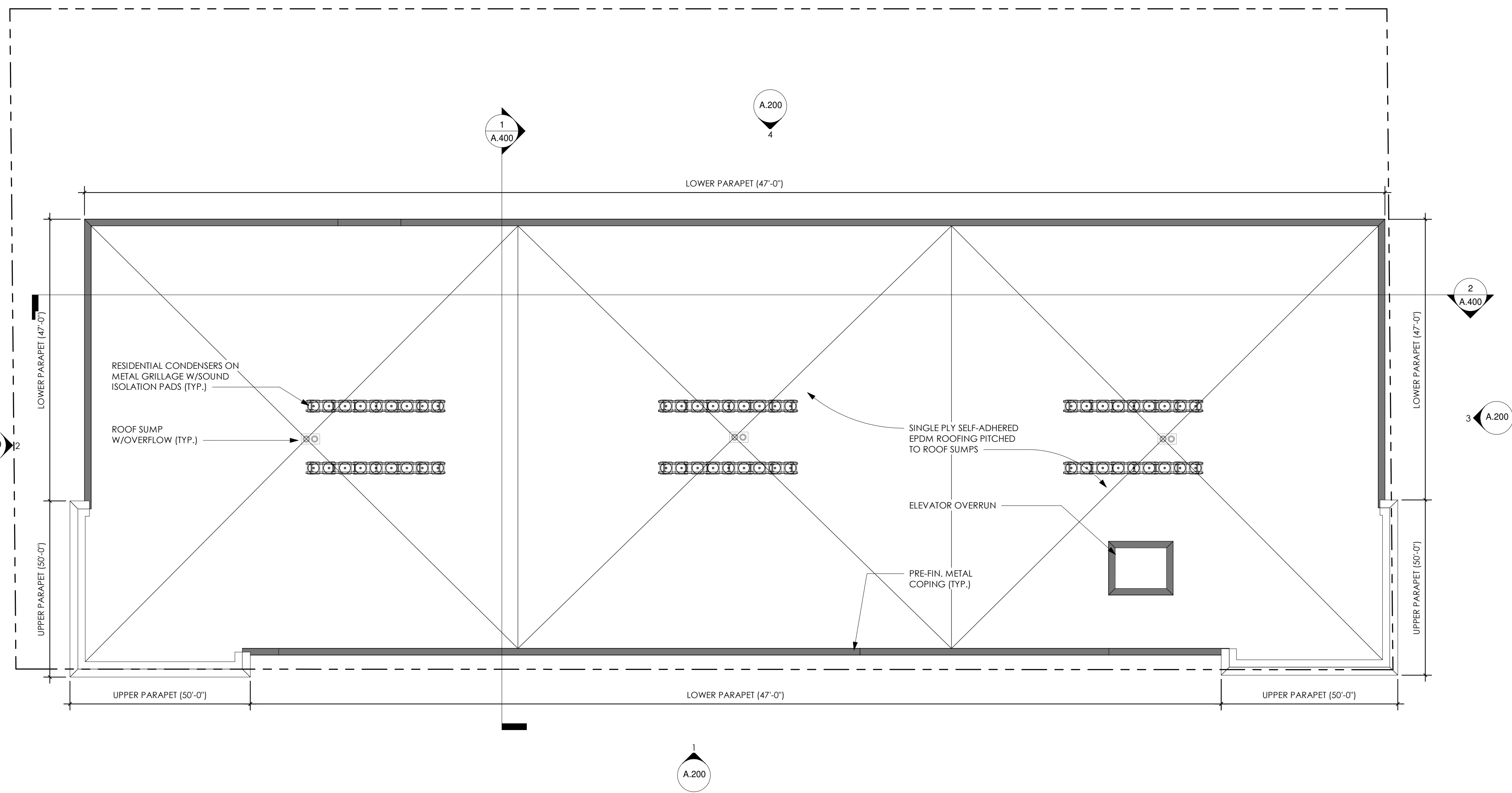
North Arrow: _____

Sheet Title: _____
 Roof Plan

Project Number: _____
 Project Number

Scale: _____
 3/32" = 1'-0"

Sheet Number: _____
A.103



Roof Plan

3/32" = 1'-0"

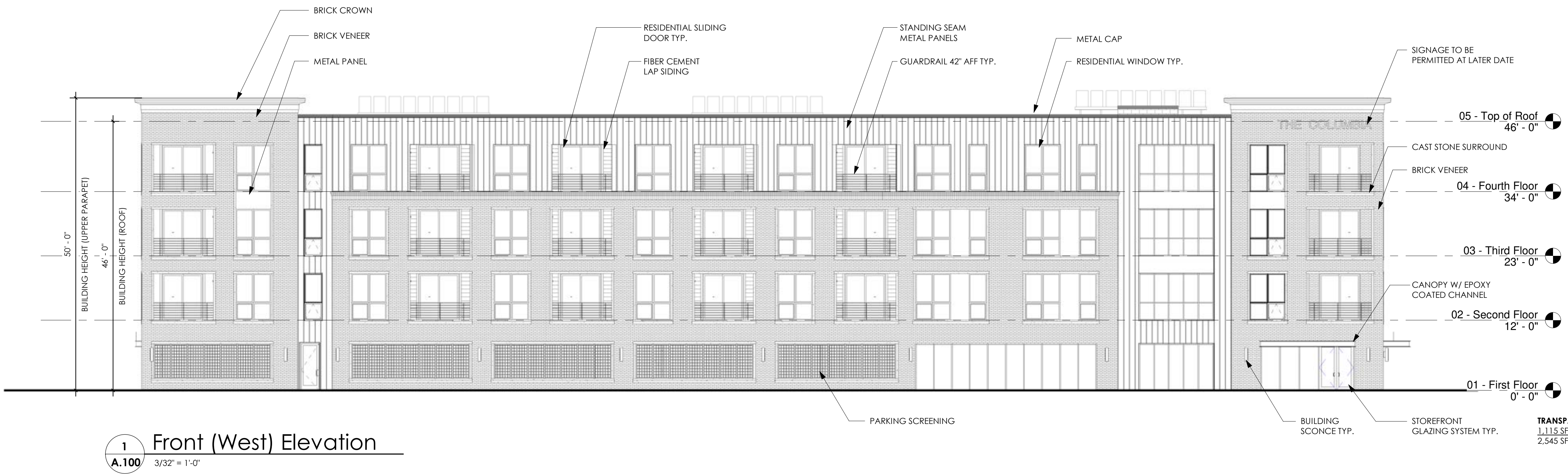
PRELIMINARY NOT FOR CONSTRUCTION

Client:
WJ Ventures, LLC

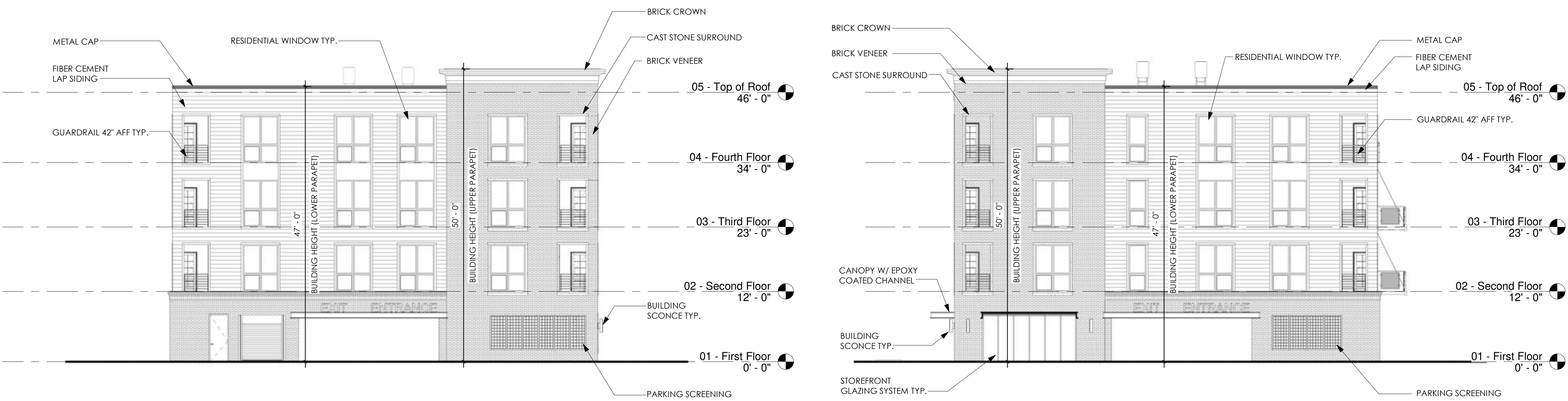
Project:
The Columbia
2476 Columbia Rd.
Berkley, MI 48072

Issued	Description	By
02.13.2025	Revised PUD	

TRANSPARENCY CALCULATION:
1,115 SF OPENINGS
2,545 SF TOTAL x100 = 44%



1 Front (West) Elevation
A.100 3/32" = 1'-0"



2 Left (North) Elevation
A.100 3/32" = 1'-0"

3 Right (South) Elevation
A.100 3/32" = 1'-0"



4 Rear (East) Elevation
A.100 3/32" = 1'-0"

PRELIMINARY NOT FOR CONSTRUCTION

Seal:



Note:
Do not scale drawings. Use
calculated dimensions only.
Verify existing conditions in
field.

North Arrow:

Sheet Title:
Elevations

Project Number:
Project Number

Scale:
3/32" = 1'-0"

Sheet Number:

A.200

Client: _____
WJ Ventures, LLC

Project: _____
The Columbia
2476 Columbia Rd.
Berkley, MI 48072



Front (West) Elevation



Left (North) Elevation

Right (South) Elevation



Rear (East) Elevation

PRELIMINARY NOT FOR CONSTRUCTION

Issued	Description	By
02.13.2025	Revised PUD	

Seal: _____



Note: _____
Do not scale drawings. Use
calculated dimensions only.
Verify existing conditions in
field.

North Arrow: _____

Sheet Title: _____
Rendered
Elevations

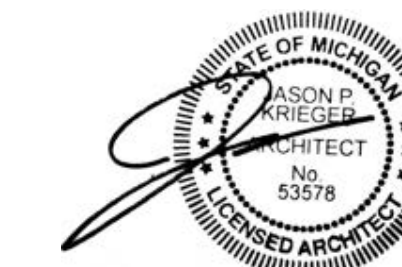
Project Number: _____
Project Number

Scale: _____

Sheet Number: _____
A.201

Issued	Description	By
02.13.2025	Revised PUD	
03.13.2025	Revised PUD Rev #1	

Seal: _____



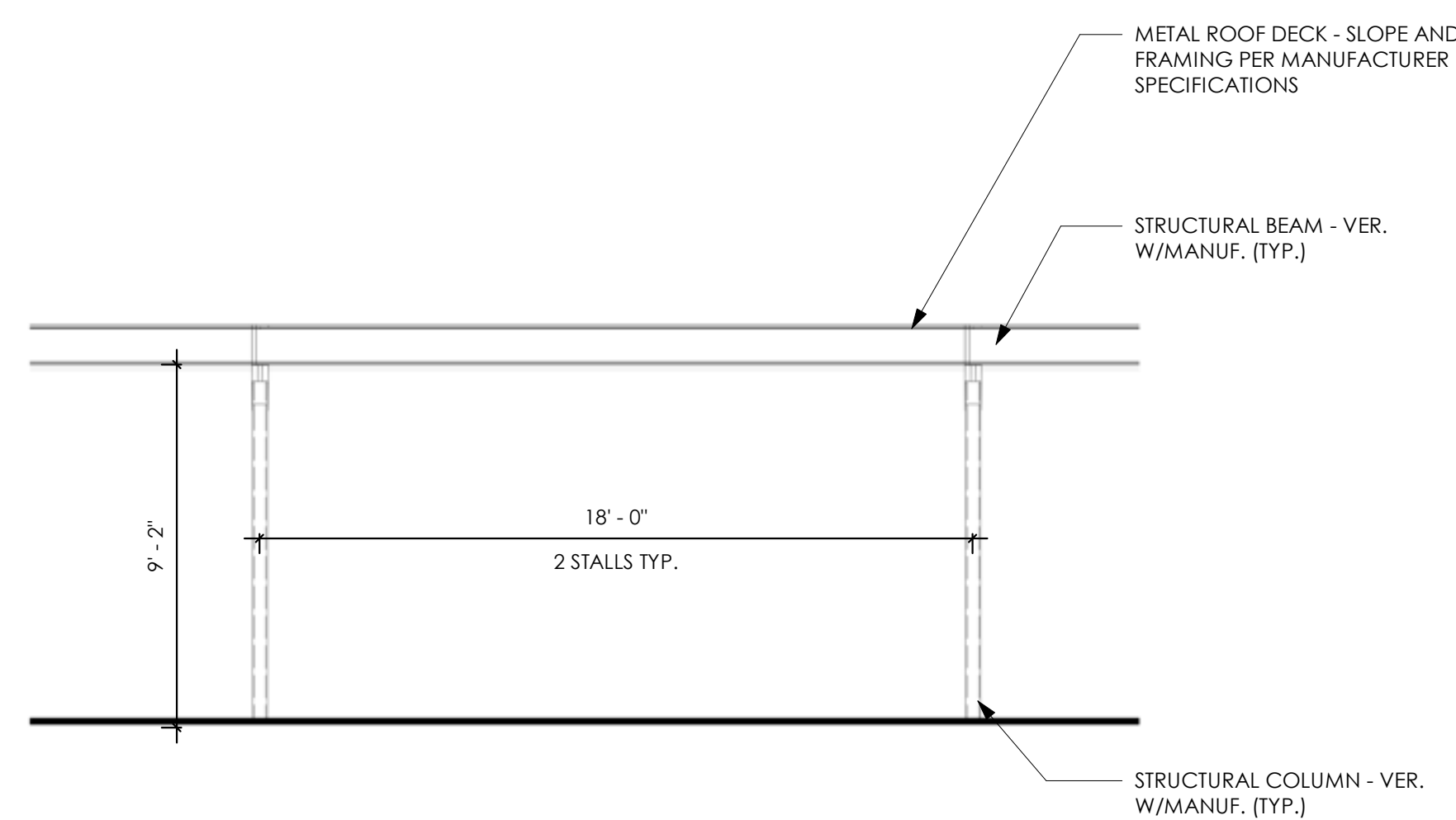
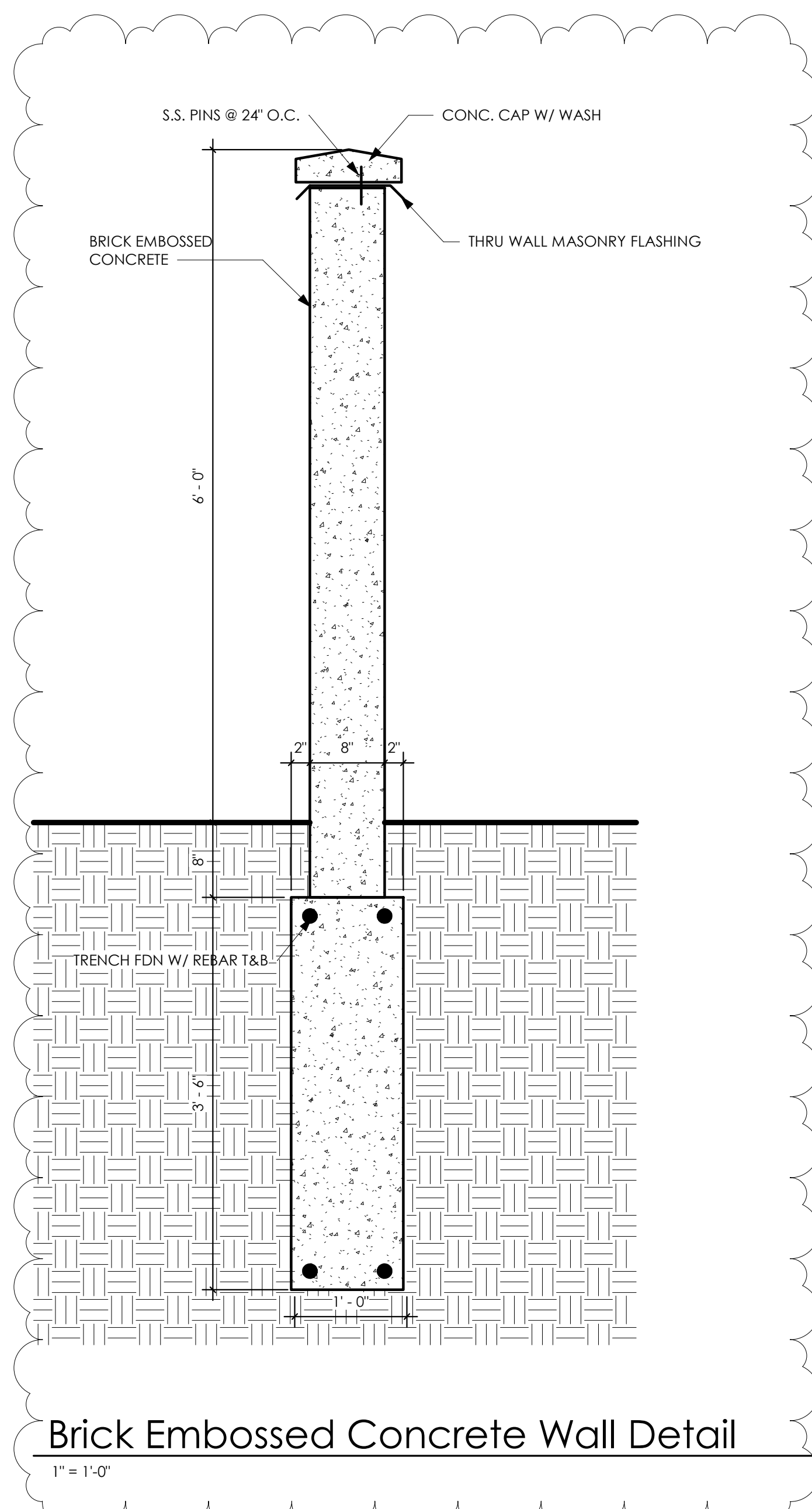
Note: Do not scale drawings. Use calculated dimensions only. Verify existing conditions in field.
North Arrow: _____

Sheet Title: _____
Carport Elevations

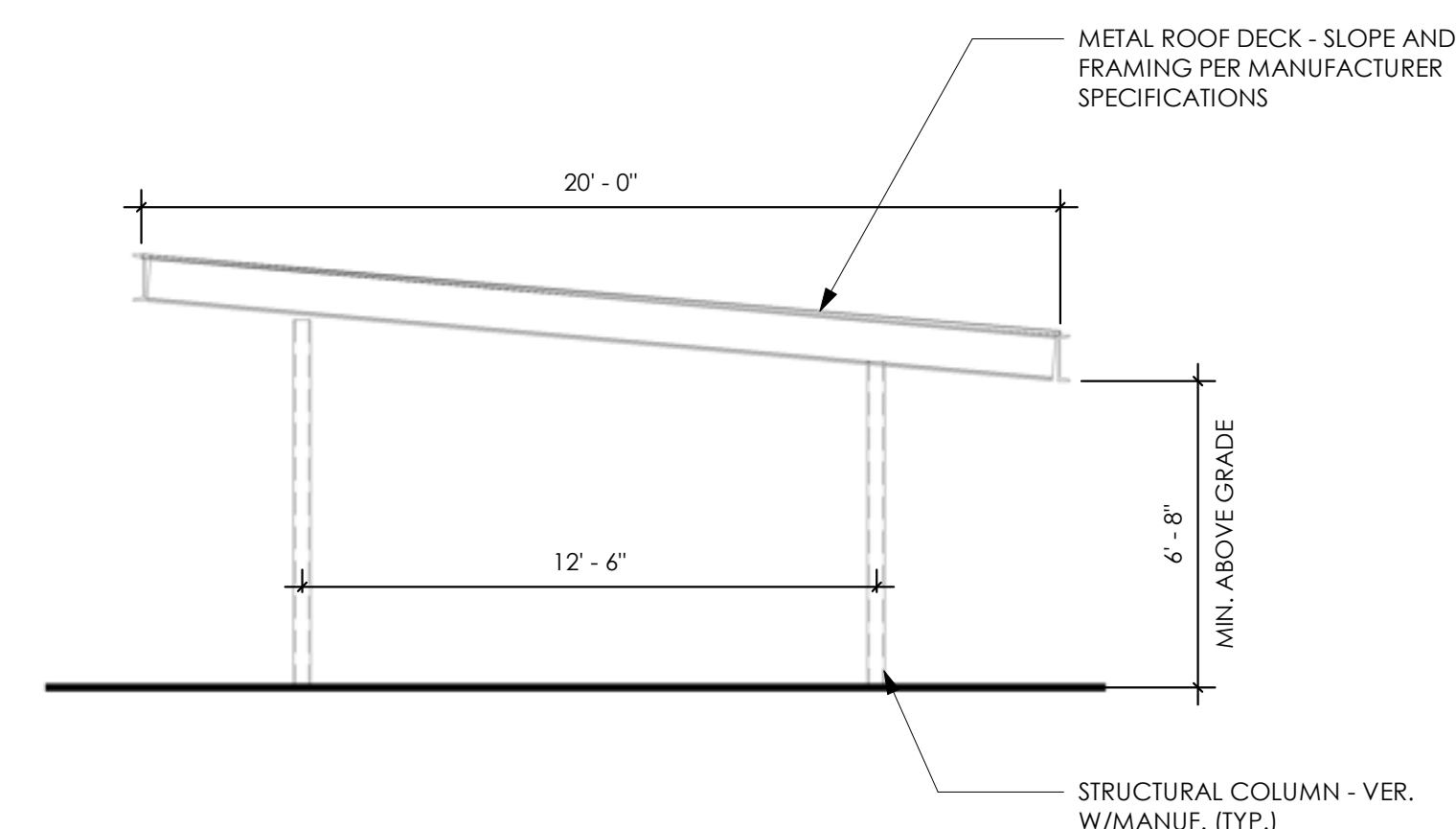
Project Number: _____
Project Number
Scale: _____
As indicated

Sheet Number: _____
A.202

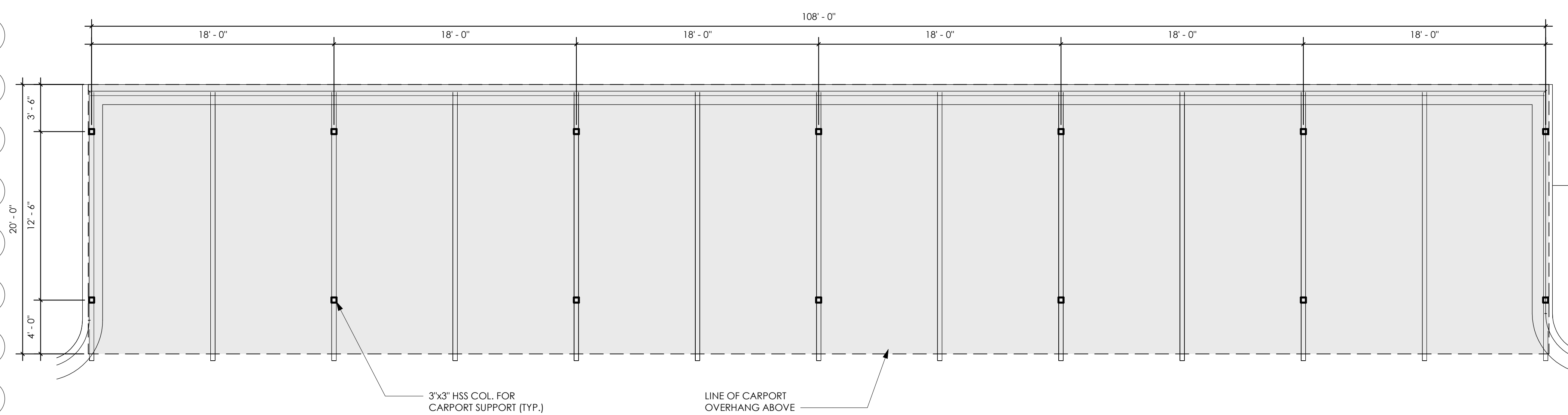
PRELIMINARY NOT FOR CONSTRUCTION



1 Partial Typical Carport Front Elevation
1/4" = 1'-0"

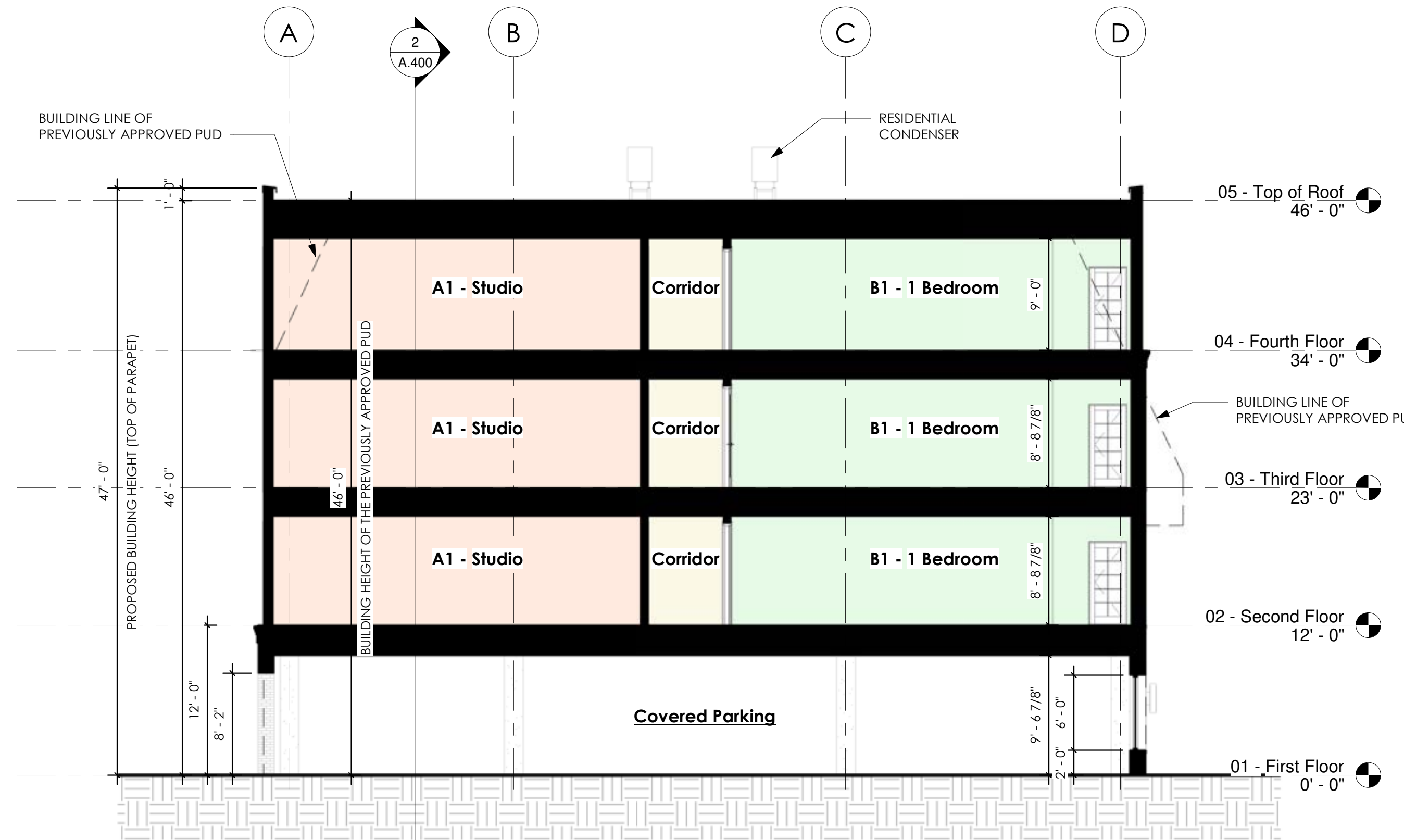


2 Carport Typical Side Elevation
1/4" = 1'-0"

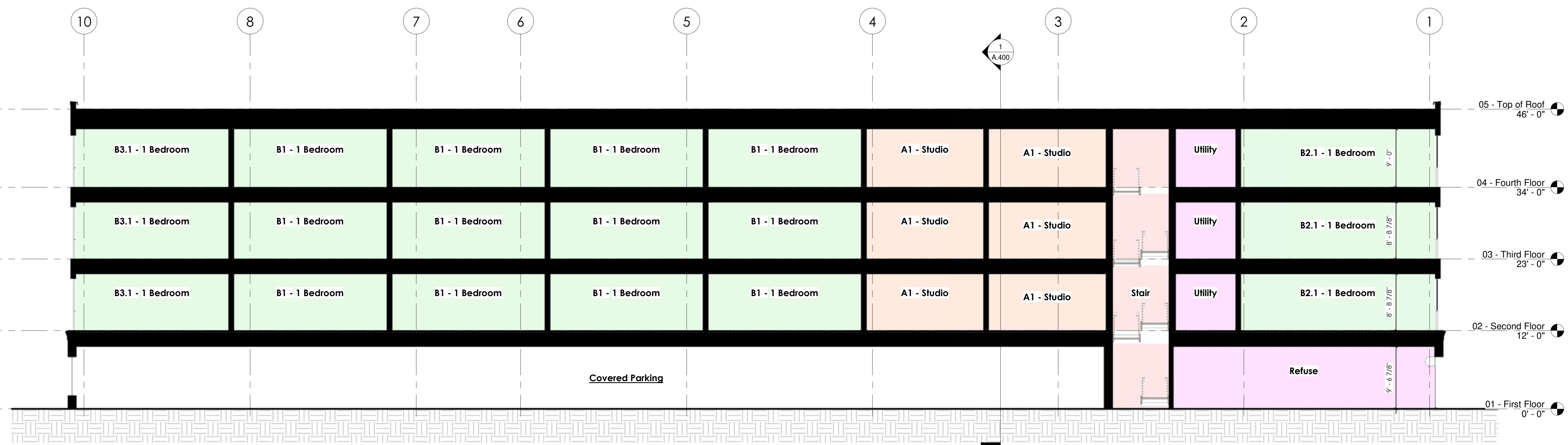


First Floor Plan - Carport
3/16" = 1'-0"

Issued	Description	By
02.13.2025	Revised PUD	



1 Building Section 1
A.100 1/8" = 1'-0"



2 Building Section 2
A.100 1/8" = 1'-0"

PRELIMINARY NOT FOR CONSTRUCTION

Seal: _____



Note:
 Do not scale drawings. Use calculated dimensions only. Verify existing conditions in field.
 North Arrow: _____

Sheet Title:
 Building Sections

Project Number: _____

Project Number

Scale:

1/8" = 1'-0"

Sheet Number: _____

A.400

February 14, 2025

Kristen Kapelanski
City of Berkley Community Development Director
3338 Coolidge Hwy.
Berkley, MI 48072

Re: The Columbia - 2476 Columbia Rd. – SPA/PUD Resubmittal

On June 17, 2024 the above referenced project was presented to the City Council and the Final PUD plans were approved. Since then, the development team has brought on Krieger Klatt Architects, Inc. (KKA) to be the Architect of Record for the project. We have redesigned the project to better align with today's market and construction costs while still maintaining the original intent from the approved PUD. We have updated all plans and are including them in this resubmittal package titled "02.13.2025 Revised PUD". We are seeking approval from the Planning Commission for the attached plans to then meet with City Council to finalize the PUD and revised Development Agreement. Please see below for a list of notable revisions that were made to the original PUD plans.

1. Eliminated the Southern Building:
 - a. Building 2 separate buildings is an expensive endeavor. We are now proposing one 4-story building on the larger North Parcel between Columbia and Cambridge.
 - b. The Southern parcel now contains a surface parking lot with carports (sheet **A.202**) and a pocket park on Coolidge. The pocket park contains seating areas at the Cambridge/Coolidge corner with a large landscaping area to screen the parking area from Coolidge and the neighbors to the east.
2. Building Revisions:
 - a. Per ordinance, the original PUD was using sloped walls on floor 4 to be classified as a "mansard roof" which allows the building height to be measured to the midpoint of the sloped "roof". This measured 40'-0" to the midpoint but the flat "deck" of the roof would have been 46'-0". The proposed building eliminated these sloped walls. The measurement to the top of deck is 46'-0" so, the building massing has not changed from the original PUD plans.
 - i. Please see sheet **A.400** "Building Section 1" which contains an outline of the original PUD building. Note that the roof deck in the original plans was at 45'-0". This does not include the roof pitch. In our opinion, the original building would have had a roof deck height of 46'-0" which matches what we are proposing.
 - ii. The lower parapet is set at 47'-0" (1' above the roof deck) to allow for proper waterproofing.
 - iii. The upper parapet (located at the North and South corner of the building) is set at 50'-0" and is being proposed to provide visual interest at these premier corners. Please refer to sheets **A.103, A.200, and A.201**.
 - b. The first-floor lobby has been increased in size to allow for all amenities and mail room to be located on this floor. The increased lobby width will be more attractive and will create more pedestrian activity along Coolidge. The stairs and elevators have been relocated to allow for living spaces to be on the corners of the building.
 - c. The unit count has decreased from 57 units to 51 units with a similar mix of 1-bedroom and studio units.
 - d. Inset and wall-hung balconies are being proposed for most units. The 4th floor has no wall-hung balconies facing the neighbors to the east.
 - e. The exterior materials being proposed are brick/masonry and standing seam metal siding facing Coolidge. This matches the original design intent while adjusting for the new building look. We are proposing a red/brown brick instead of the white/cream brick from the original PUD as we feel the new brick color will fit in better with the surrounding properties and look of Berkley.

- f. The exterior materials being proposed on the East, part of the North, and part of the South elevations are a mixture of brick/masonry and cement board siding. We feel that the horizontal siding on these elevations helps the transition to the single-family residential lots to the east.
- 3. Important items to point out that remain the same or less than the original PUD drawings.
 - a. Eliminated the southern building
 - b. Reduced the unit count from 57 units to 51 units
 - c. Parking ratio increases from 1.351 to 1.353 and does not contain any tandem parking spaces
 - d. Compact parking ratio is 34.8% of the total parking provided, which is under the 36% that was approved in the original PUD.
 - e. The N/S drive aisle in the covered parking area is now a two-way drive to aid in vehicular circulation.
 - f. Glazing requirements are being met
 - g. The first floor parking area has openings with screening to hide the parking spaces but also create an attractive elevation.
 - h. The North setback remains 10'. The South setback remains 0'. The West (Coolidge) setback has decreased from 5'-3 3/4" to 2'-0". The East setback has increased from 31'-10" to 33'-7 1/8".
 - i. Please note that the benches, trash cans, landscaping and sidewalk improvements on the Coolidge frontage remains from the original PUD.
 - ii. Please note that the original PUD plans had exterior balconies on Coolidge that were 2'-0 1/8" from the West property line. We are proposing inset balconies on this façade which will match this 2'-0" setback from the property line.
 - i. The required Type A (accessible) dwelling units will be provided as required per code.
 - j. The required 6' masonry screen wall between the property and the neighboring properties to the east will remain.
 - i. Please note that the Southern parcel parking is pushed 5' west of the property line to allow for plantings between the screen wall and the parking spaces.

We believe that the revisions that are being proposed meet the design intent of the original approved PUD plans, while providing some enhancements that will create a beautiful development. We are very excited to present this to you and look forward to your feedback and approval to proceed. If you have any further comments, concerns or questions; please do not hesitate to contact me. We look forward to your next review and bringing this project to fruition.

Thank you,

Raymond J. Phillips
Director of Design
ray@kriegerklatt.com
248-414-9270 ext. 106



Memorandum

To: Joseph K. Anderson, PE, PLA, LEED-AP Date: October 24, 2023
From: Mohamed Aguib, PE Project: The Columbia
: Traffic Engineer
RE: The Columbia Traffic Project Number: 20388.00
Impact Assessment Memo

This traffic impact assessment memorandum was prepared for the proposed 57-unit residential development in Berkley. The project site is adjacent to Coolidge Highway between Cambridge Road and Columbia Road and covering four residential lots with existing single-family houses. The proposed development consists of redeveloping the subject lots into a 57-unit 3.5 story apartment building with parking lot on the ground level. Site access is currently provided on both Cambridge Road and Columbia Road and is intended to be maintained similarly. An overview of the study area and areas of interest are shown in **Figure 1**.

The purpose of this traffic impact assessment memo is to estimate trip generated numbers for the proposed residential use and to compare them with those generated by the code compliant uses previously approved for the lots but not built. In addition, the study discusses the results of capacity analysis during morning and evening peak hours at the nearest intersections based on historical data from MDOT and traffic assumptions. The conclusions of this study are summarized below:

Conclusions

- ITE trip generation rates and estimates were utilized to calculate the number of weekday morning (AM) and evening (PM) peak hour peak hour trips. The latest ITE Trip Generation Manual 11th Edition was utilized accordingly as shown on Table 1.
- The proposed development, which includes residential only, is expected to generate 41 trips (10 enter and 31 exit) during the morning (AM) and 45 trips (28 enter and 17 exit) during the evening peak hours.
- The code-compliant uses, which includes retail, office and residential, for the same lots would generate 52 trips (22 enter and 30 exit) during the morning (AM) and 86 trips (44 enter and 42 exit) during the evening peak hours.
- The proposed development is expected to generate lower trips than those under the code-compliant plan, consequently, less impact on the surrounding roadway network.
- The subject site is planned to maintain the existing full-access driveways on Cambridge Road and Columbia Road. All driveways are stop-controlled on the minor approach.

- Surface parking is provided on site on the ground level of the building.
- Pedestrian walking facilities and accessibility will be maintained around the site and connecting to the neighborhood.
- At the intersection of Coolidge Highway and Cambridge Road, the results of the morning (AM) and evening (PM) peak hour capacity analysis for the existing and future conditions show acceptable levels of service.
- At the intersection of Coolidge Highway and Columbia Road, the results of the morning (AM) and evening (PM) capacity analysis for the existing and future conditions show lower than acceptable levels of service at the minor approaches, side street approaches. However, the levels of service for the major approaches are acceptable. The lower levels of service during the evening (PM) peak hour are mainly due to the high traffic volume on Coolidge Highway, which is typical for most driveways along this major street.

Roadway Network Characteristics

Coolidge Highway is a three-lane minor arterial with a posted speed limit of 30 mph in the study area. The cross section of Coolidge Highway consists of one-lane each way and a center two-way left-turn lane. Bike lanes and pedestrian sidewalks are provided on both sides of the road. A traffic count station located south of the site shows an AADT (2022) of 20,239 as per Michigan Department of Transportation's (MDOT) Transportation Data Management System (TDMS).

Traffic Data from MDOT

Turning movement counts in the study area, for limited movements, were collected from MDOT database and used accordingly to estimate the traffic volumes at the intersections of Coolidge Highway at Cambridge Road and Columbia Road. These traffic counts were conducted in October of 2022 at a station south of Eleven Mile Road, for the major approaches on Coolidge Highway, during a weekday morning (7:00am to 9:00am) and evening (4:00pm to 6:00pm) peak periods. The existing peak hour traffic volumes are shown in Figure 2.

Trip Generation Summary

The published peak hour trip generation rates, along with inbound/outbound distribution from the Institute of Transportation Engineers (ITE) Trip Generation Manual (11th Edition) were utilized to calculate the number off peak hour trips for the proposed and code-compliant uses.

For the proposed Berkley Condos development, the land use in this evaluation includes Multifamily Housing (Low-rise). The proposed development is expected to generate a total of 41 trips (10 enter and 31 out) during the morning peak hour and a total of 45 trips (28 enter and 17 exit) during the evening peak hour, as shown in Table 1 and Figure 4. The table also shows the uses approved for the subject lots and their relative sizes which include retail, office, and multifamily uses.

The comparison of the proposed (residential only) use and the code-compliant uses have shown that the proposed uses would generate a lower number of trips during the morning and evening peak hours. This difference in the total number of trips is shown in the last line of Table 1.

Table 1: Trip Generation Summary¹

Type	Use	ITE Code	Size	Units	Weekday Trips	AM Peak-Hour Trips			PM Peak-Hour Trips		
						In	Out	Total	In	Out	Total
Proposed	Multifamily Housing (Low-Rise)	220	57	DU	441	10	31	41	28	17	45
	Total Trips				441	10	31	41	28	17	45
Code Compliant	Retail	822	5,760	SF	473	12	8	20	26	27	53
	Office	712	3,150	SF	45	4	1	5	2	5	7
	Multifamily Housing (Low-Rise)	220	12	DU	152	6	21	27	16	10	26
	Total Trips				670	22	30	52	44	42	86
Difference between Proposed and Code Compliant Uses					-229	-12	1	-11	-16	-25	-41

¹A trip is a one-directional vehicular movement into or out of the site. These forecasts are based on trip rates and application methodology recommended by the Institute of Transportation Engineers in its *Trip Generation Manual –11th Edition* (2021).

Capacity Analysis for Existing and Future Conditions

Method and Criteria – Intersection capacity analysis was conducted using the Synchro 11 computerized traffic model, based on methodologies contained in the Transportation Research Board’s Highway Capacity Manual (HCM).

The primary objective of the capacity analysis is to determine the level of service, a qualitative measure of the “ease” of traffic flow based on vehicular delay. Analytical models are used to estimate the average control delay by approach and vehicular (through or turning) movement – and in the case of signalized and all-way stop-controlled intersections – the overall intersection as well. The traffic models account for lane configuration, grade (if any), type of traffic control, traffic volume and composition, and other traffic flow parameters.

Level of service (LOS) is expressed on a letter-based grading scale, with A being the highest level and F being the lowest level. Historically, achieving a LOS D or better has been the normal objective in an urban or suburban area; however, LOS E or worse may be unavoidable at some locations along heavily traveled roadways.

During the morning (AM) and evening (PM) peak hours, the results of the capacity analysis for the existing and future conditions show acceptable levels of service of D or better at the intersection of Coolidge Highway at Cambridge Road.

During the morning (AM) and evening (PM) peak hours, the results of the capacity analysis for the existing and future conditions show lower than acceptable levels of service for the minor approaches at the intersection of Coolidge Highway at Columbia Road. However, the levels of service for the major approaches are acceptable. These levels were found during existing

conditions and are expected to continue in the future after the proposed development completion. However, these conditions are typical of most of the minor approaches along this corridor and are expected to operate normally.

Conclusion

The proposed residential development is expected to maintain the expected addition of traffic impacts on the study area. The results of additional site generated traffic are expected to be within roadway and intersection capacities. In comparison with the code compliant site plan, the proposed development is reducing the number of added vehicles to the roadway network.

APPENDIX

1. Traffic Study Figures
2. Site Plans (Proposed & Code Compliant)
3. SYNCHRO Analysis Output Sheets
4. MDOT TDMS Traffic Count Data



Figure 1. Study Area

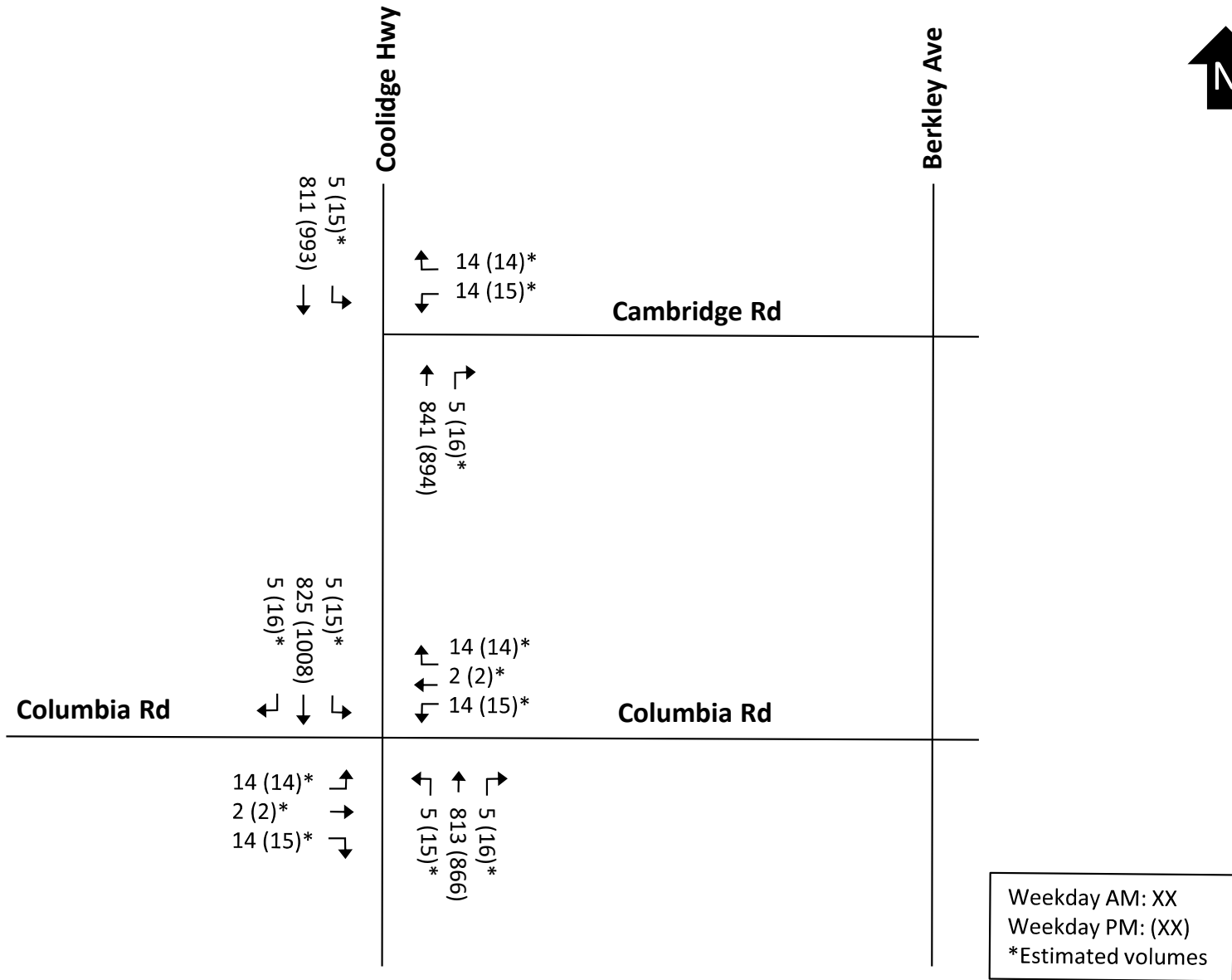


Figure 2. Existing Peak-Hour Volumes

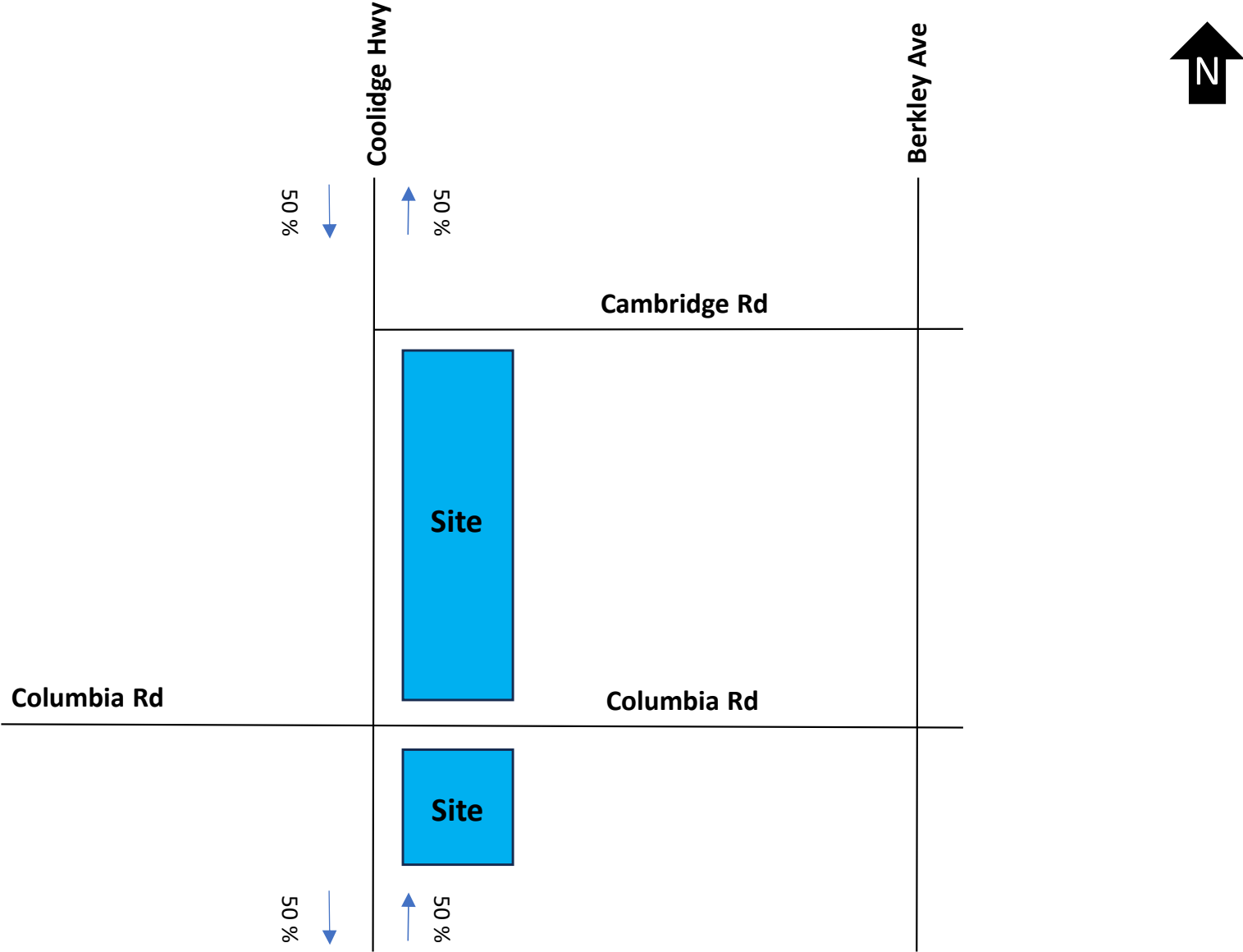


Figure 3. Trip Distribution

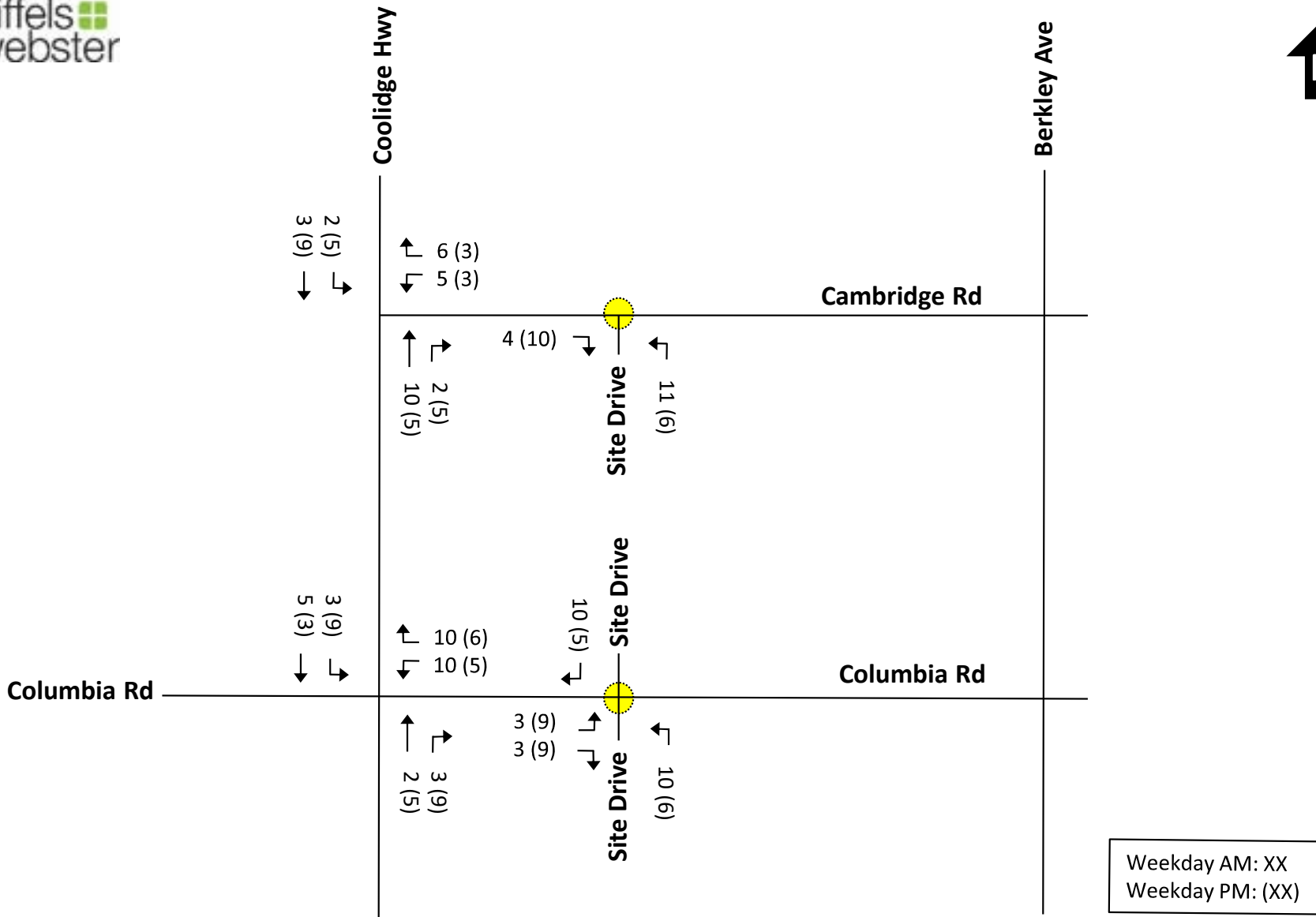


Figure 4. Site Generated Peak-Hour Trip Assignment

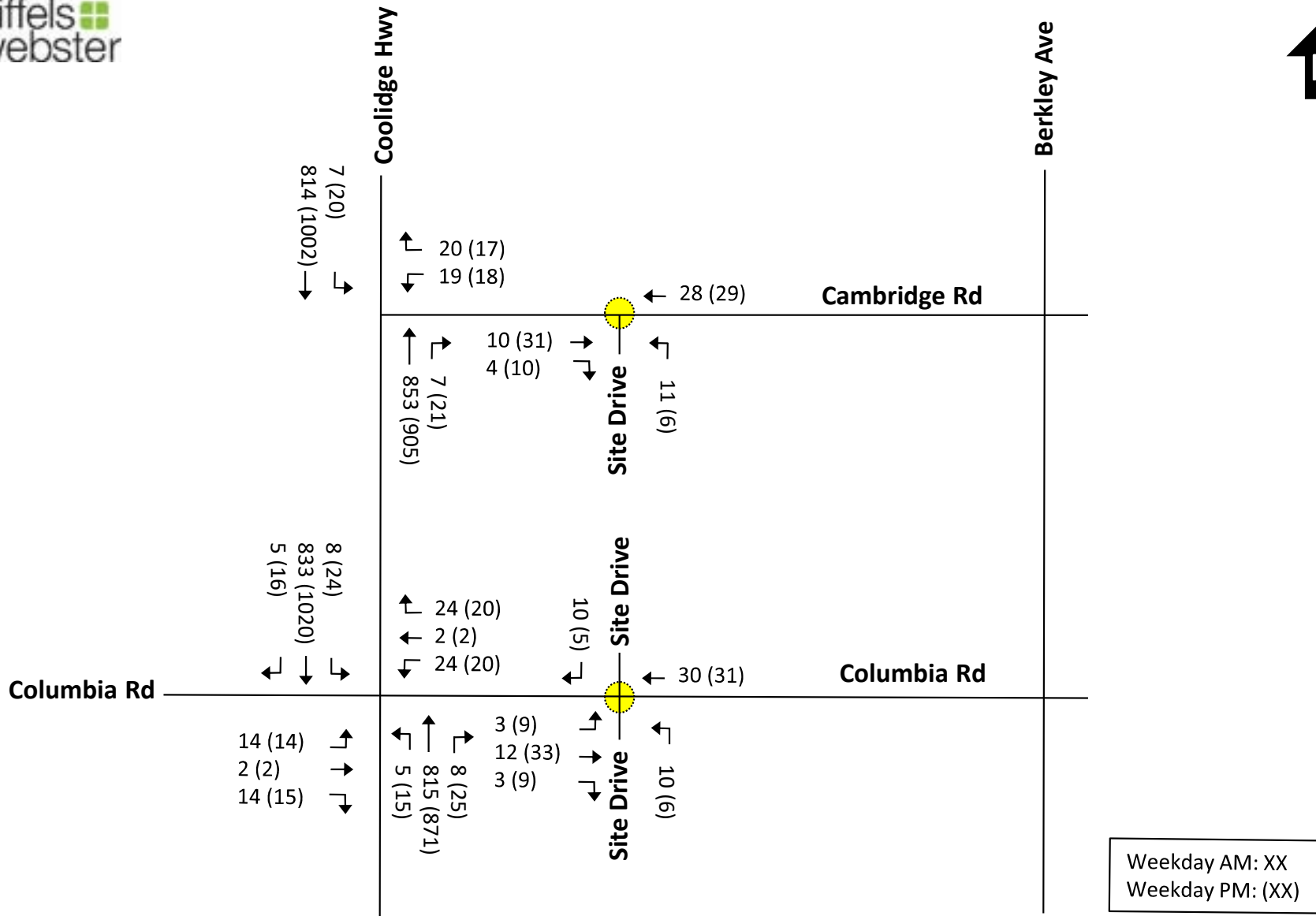
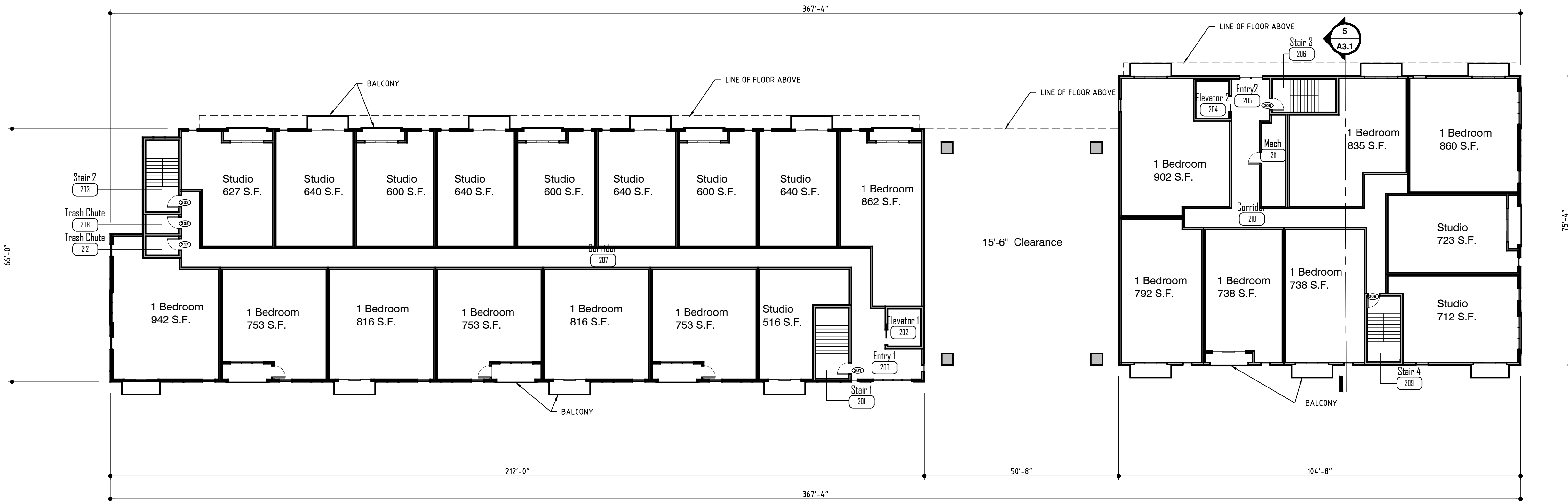


Figure 5. Future Peak-Hour Volumes



BUILDING SUMMARY

Main Floor	1,476 S.F.
Second Floor	20,351 S.F.
Third Floor	24,710 S.F.
Loft	4,669 S.F.
Total	52,685 S.F.

UNIT SUMMARY

Studio with Balcony	7
Studio with Juliet Balcony	5
1 Bedroom with Balcony	14
1 Bedroom with Juliet Balcony	10
1 Bedroom with Juliet Balcony and Patio	4
Studio Loft and Patio	14
1 Bedroom Loft and Patio	3
Total	57

MISS DIG

MISS DIG TICKET NUMBER #B012982740-00B

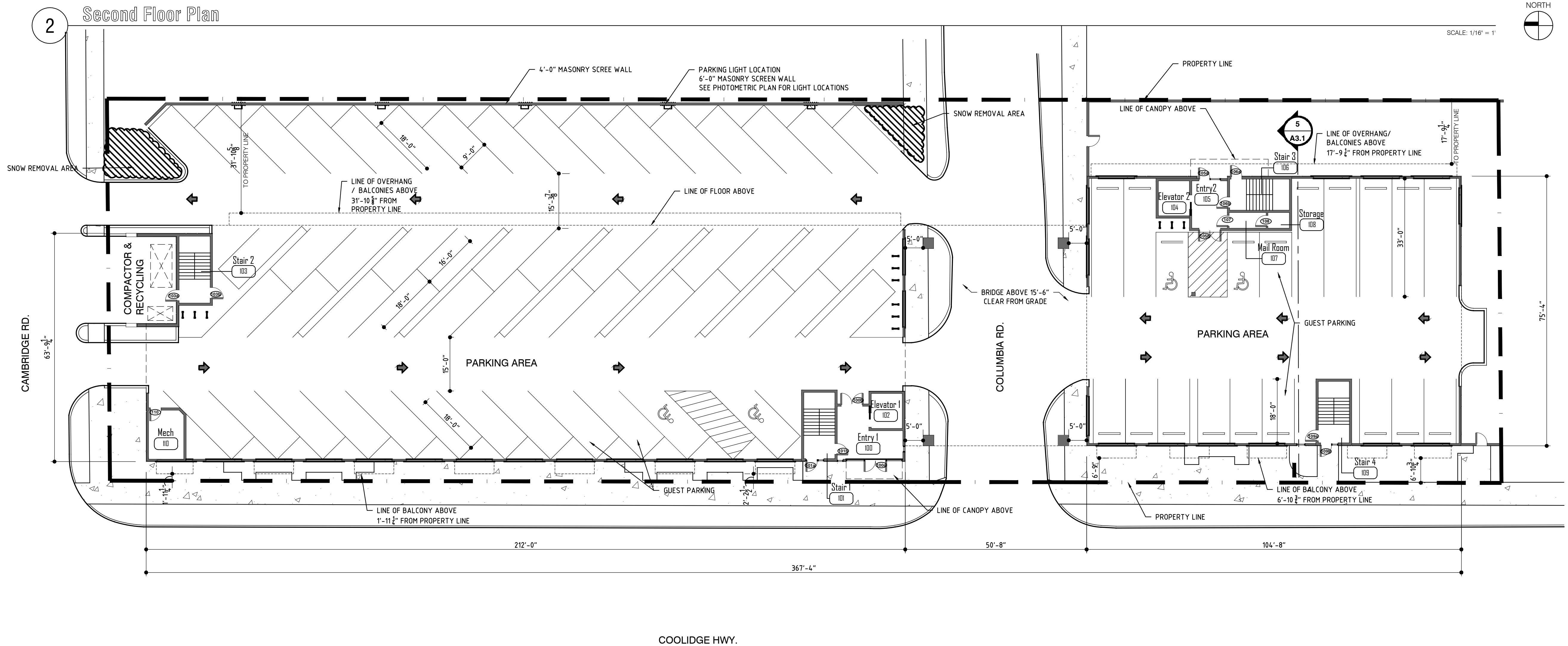
SETBACK RELIEF

ANY PROJECTIONS OCCUR ABOVE 8' FROM GRADE. FRONT SETBACK RELIEF IS NEEDED, HOWEVER BASED ON AVERAGE FRONT SETBACKS, THIS SHOULD BE CONSIDERED.

3300 AUBURN RD, SUITE 300
 AUBURN HILLS, MI 48326
 T: 248.601.4422 F: 248.453.5854
 WWW.DESIGNHAUS.COM
 INFO@DESIGNHAUS.COM

DESIGNHAUS EST 1998
ARCHITECTURE

2 Second Floor Plan



1 Ground Floor Plan

The Columbia
 2465, 2475, 2466, 2476 Columbia and 2475, 2465 Cambridge St.
 Berkley, MI 48072

Ground Floor Plan & Second Floor Plan

023010
A1.1

A1.1 First Floor Plan.dwg

10/12/2023

User



BUILDING A

Zoned: Gateway
 Building Use: Floor 1 Retail/ Office 5,760 SF | Floor 2-3 Multifamily 11,520 SF

Unit Count: Floor 2 4 Units | Floor 3 4 Units

Maximum Building Height:
 40' Max Height - 40' Tall

Maximum Lot Coverage:
 90%

Setbacks:

Required	Proposed
Front: 10'	10'
Sides: 0'	0'
Rear: 10'	10'

Parking

Retail/ Office: One space per 225 SF of usable floor area
 Multi-family: Two spaces per dwelling unit

Retail/ Office: 18 spaces required
 Multi-family: 16 spaces required
 Total: 34 spaces required
 37 Spaces Provided

BUILDING B

Zoned: Gateway
 Building Use: Floor 1 Retail/ Office 3,150 SF | Floor 2-3 Multifamily 6,300 SF

Unit Count: Floor 2 2 Units | Floor 3 2 Units

Maximum Building Height:
 40' Max Height - 40' Tall

Maximum Lot Coverage:
 90%

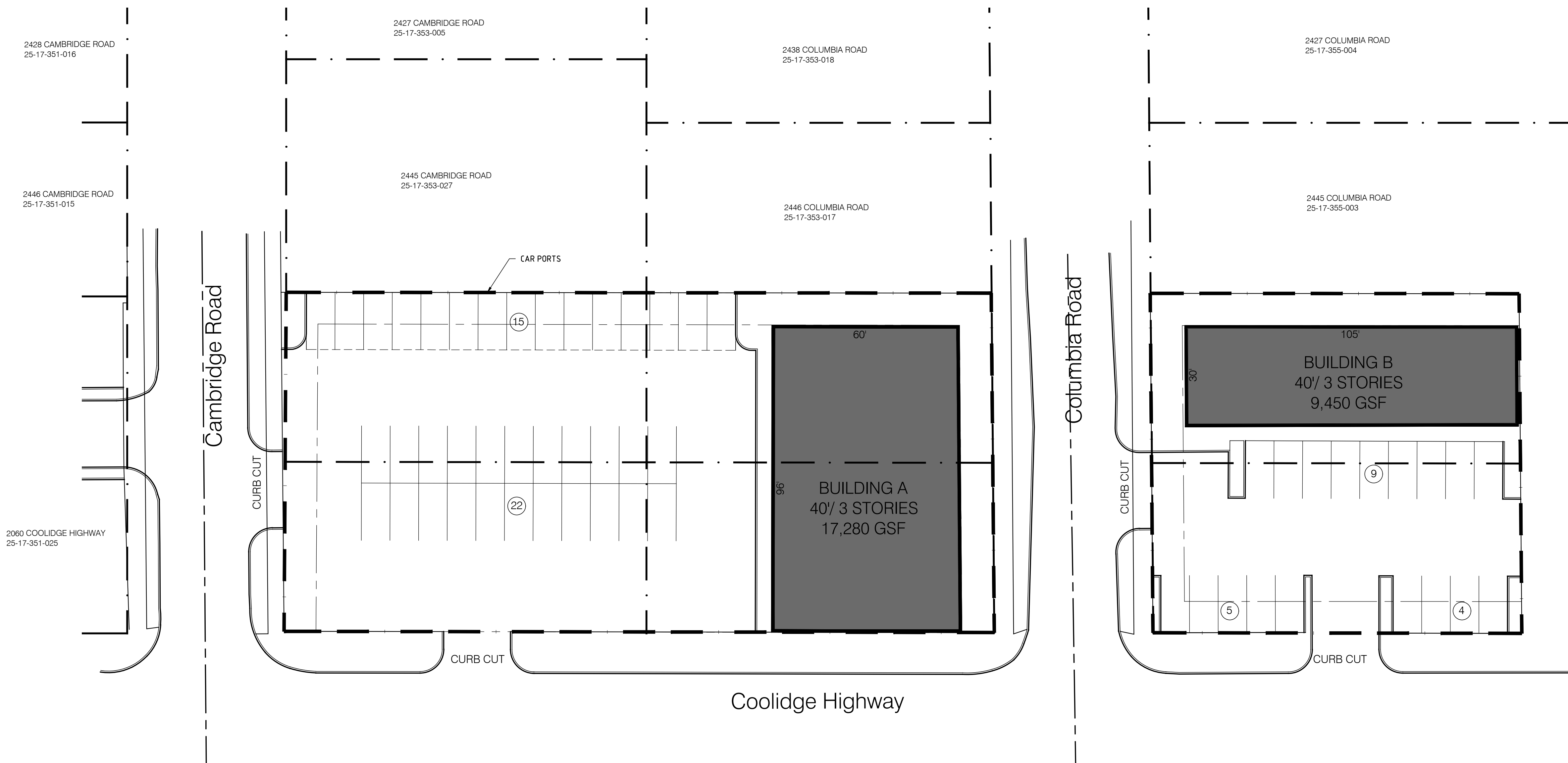
Setbacks:

Required	Proposed
Front: 10'	10'
Sides: 0'	0'
Rear: 10'	10'

Parking

Retail/ Office: One space per 225 SF of usable floor area
 Multi-family: Two spaces per dwelling unit

Retail/ Office: 10 spaces required
 Multi-family: 8 spaces required
 Total: 18 spaces required
 18 Spaces Provided



1 Architectural Site Plan
 SCALE: 1" = 20'
 NORTH

DESIGNHAUS ARCHITECTURE
 EST 1998
 3300 AUBURN RD, SUITE 300
 AUBURN HILLS, MI 48326
 T: 248.601.4422 F: 248.453.5854
 WWW.DESIGNHAUS.COM
 INFO@DESIGNHAUS.COM

PUD Submit	07/21/23
ISSUANCE	DATE

The Columbia
 2465, 2475, 2466, 2476 Columbia and 2475, 2465 Cambridge St.
 Berkley, MI 48072
Code Compliant Site Plan

023010
A5.1

A5.1 Compliance Plan.dwg

7/25/2023

Designhaus

Intersection						
Int Delay, s/veh	0.4					
Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Vol, veh/h	14	14	841	5	5	811
Future Vol, veh/h	14	14	841	5	5	811
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	-	-	-	100	-
Veh in Median Storage, #	0	-	0	-	-	0
Grade, %	0	-	0	-	-	0
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	15	15	914	5	5	882

Major/Minor	Minor1	Major1	Major2		
Conflicting Flow All	1809	917	0	0	919
Stage 1	917	-	-	-	-
Stage 2	892	-	-	-	-
Critical Hdwy	6.42	6.22	-	-	4.12
Critical Hdwy Stg 1	5.42	-	-	-	-
Critical Hdwy Stg 2	5.42	-	-	-	-
Follow-up Hdwy	3.518	3.318	-	-	2.218
Pot Cap-1 Maneuver	87	330	-	-	743
Stage 1	390	-	-	-	-
Stage 2	400	-	-	-	-
Platoon blocked, %			-	-	-
Mov Cap-1 Maneuver	86	330	-	-	743
Mov Cap-2 Maneuver	219	-	-	-	-
Stage 1	390	-	-	-	-
Stage 2	397	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s	20.5	0	0.1
HCM LOS	C		

Minor Lane/Major Mvmt	NBT	NBRWBLn1	SBL	SBT
Capacity (veh/h)	-	-	263	743
HCM Lane V/C Ratio	-	-	0.116	0.007
HCM Control Delay (s)	-	-	20.5	9.9
HCM Lane LOS	-	-	C	A
HCM 95th %tile Q(veh)	-	-	0.4	0

Intersection												
Int Delay, s/veh	2											
Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		↕			↕		↕	↕		↕	↕	
Traffic Vol, veh/h	14	2	14	14	2	14	5	813	5	5	825	5
Future Vol, veh/h	14	2	14	14	2	14	5	813	5	5	825	5
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	100	-	-	100	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	95	95	95	95	95	95	95	95	95	95	95	92
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	15	2	15	15	2	15	5	856	5	5	868	5

Major/Minor	Minor2		Minor1		Major1		Major2					
Conflicting Flow All	1758	1752	871	1758	1752	859	873	0	0	861	0	0
Stage 1	881	881	-	869	869	-	-	-	-	-	-	-
Stage 2	877	871	-	889	883	-	-	-	-	-	-	-
Critical Hdwy	7.12	6.52	6.22	7.12	6.52	6.22	4.12	-	-	4.12	-	-
Critical Hdwy Stg 1	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Follow-up Hdwy	3.518	4.018	3.318	3.518	4.018	3.318	2.218	-	-	2.218	-	-
Pot Cap-1 Maneuver	66	85	350	66	85	356	773	-	-	781	-	-
Stage 1	341	365	-	347	369	-	-	-	-	-	-	-
Stage 2	343	368	-	338	364	-	-	-	-	-	-	-
Platoon blocked, %								-	-	-	-	-
Mov Cap-1 Maneuver	61	84	350	61	84	356	773	-	-	781	-	-
Mov Cap-2 Maneuver	61	84	-	61	84	-	-	-	-	-	-	-
Stage 1	339	363	-	345	367	-	-	-	-	-	-	-
Stage 2	325	366	-	320	362	-	-	-	-	-	-	-

Approach	EB		WB		NB		SB	
HCM Control Delay, s	55.4		54.7		0.1		0.1	
HCM LOS	F		F					

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1WBLn1	SBL	SBT	SBR
Capacity (veh/h)	773	-	-	102	103	781	-
HCM Lane V/C Ratio	0.007	-	-	0.31	0.307	0.007	-
HCM Control Delay (s)	9.7	-	-	55.4	54.7	9.6	-
HCM Lane LOS	A	-	-	F	F	A	-
HCM 95th %tile Q(veh)	0	-	-	1.2	1.2	0	-

Intersection						
Int Delay, s/veh	0					
Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations	↔			↔	↔	
Traffic Vol, veh/h	0	0	0	0	0	0
Future Vol, veh/h	0	0	0	0	0	0
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	0	0	0	0	0	0

Major/Minor	Major1	Major2	Minor1	Minor2	Minor3
Conflicting Flow All	0	0	1	0	2
Stage 1	-	-	-	-	1
Stage 2	-	-	-	-	1
Critical Hdwy	-	-	4.12	-	6.42
Critical Hdwy Stg 1	-	-	-	-	5.42
Critical Hdwy Stg 2	-	-	-	-	5.42
Follow-up Hdwy	-	-	2.218	-	3.518
Pot Cap-1 Maneuver	-	-	1622	-	1021
Stage 1	-	-	-	-	1022
Stage 2	-	-	-	-	1022
Platoon blocked, %	-	-	-	-	-
Mov Cap-1 Maneuver	-	-	1622	-	1021
Mov Cap-2 Maneuver	-	-	-	-	1021
Stage 1	-	-	-	-	1022
Stage 2	-	-	-	-	1022

Approach	EB	WB	NB
HCM Control Delay, s	0	0	0
HCM LOS			A

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	-	-	-	1622	-
HCM Lane V/C Ratio	-	-	-	-	-
HCM Control Delay (s)	0	-	-	0	-
HCM Lane LOS	A	-	-	A	-
HCM 95th %tile Q(veh)	-	-	-	0	-

Intersection												
Int Delay, s/veh	0											
Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		↕			↕			↕			↕	
Traffic Vol, veh/h	0	0	0	0	0	0	0	0	0	0	0	0
Future Vol, veh/h	0	0	0	0	0	0	0	0	0	0	0	0
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Free	Free	Stop	Stop	Stop	Stop	Stop	Stop
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	-	-	-	-	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	92	92	92	92	92	92	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	0	0	0	0	0	0	0	0	0	0	0	0

Major/Minor	Major1		Major2		Minor1		Minor2					
Conflicting Flow All	1	0	0	1	0	0	2	2	1	2	2	1
Stage 1	-	-	-	-	-	-	1	1	-	1	1	-
Stage 2	-	-	-	-	-	-	1	1	-	1	1	-
Critical Hdwy	4.12	-	-	4.12	-	-	7.12	6.52	6.22	7.12	6.52	6.22
Critical Hdwy Stg 1	-	-	-	-	-	-	6.12	5.52	-	6.12	5.52	-
Critical Hdwy Stg 2	-	-	-	-	-	-	6.12	5.52	-	6.12	5.52	-
Follow-up Hdwy	2.218	-	-	2.218	-	-	3.518	4.018	3.318	3.518	4.018	3.318
Pot Cap-1 Maneuver	1622	-	-	1622	-	-	1020	894	1084	1020	894	1084
Stage 1	-	-	-	-	-	-	1022	895	-	1022	895	-
Stage 2	-	-	-	-	-	-	1022	895	-	1022	895	-
Platoon blocked, %	-	-	-	-	-	-	-	-	-	-	-	-
Mov Cap-1 Maneuver	1622	-	-	1622	-	-	1020	894	1084	1020	894	1084
Mov Cap-2 Maneuver	-	-	-	-	-	-	1020	894	-	1020	894	-
Stage 1	-	-	-	-	-	-	1022	895	-	1022	895	-
Stage 2	-	-	-	-	-	-	1022	895	-	1022	895	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	0	0	0	0
HCM LOS			A	A

Minor Lane/Major Mvmt	NBLn1	EBL	EBT	EBR	WBL	WBT	WBR	SBLn1
Capacity (veh/h)	-	1622	-	-	1622	-	-	-
HCM Lane V/C Ratio	-	-	-	-	-	-	-	-
HCM Control Delay (s)	0	0	-	-	0	-	-	0
HCM Lane LOS	A	A	-	-	A	-	-	A
HCM 95th %tile Q(veh)	-	0	-	-	0	-	-	-

Intersection						
Int Delay, s/veh	0.5					
Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Vol, veh/h	15	14	894	16	15	993
Future Vol, veh/h	15	14	894	16	15	993
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	-	-	-	100	-
Veh in Median Storage, #	0	-	0	-	-	0
Grade, %	0	-	0	-	-	0
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	16	15	972	17	16	1079

Major/Minor	Minor1	Major1	Major2		
Conflicting Flow All	2092	981	0	0	989
Stage 1	981	-	-	-	-
Stage 2	1111	-	-	-	-
Critical Hdwy	6.42	6.22	-	-	4.12
Critical Hdwy Stg 1	5.42	-	-	-	-
Critical Hdwy Stg 2	5.42	-	-	-	-
Follow-up Hdwy	3.518	3.318	-	-	2.218
Pot Cap-1 Maneuver	58	303	-	-	699
Stage 1	363	-	-	-	-
Stage 2	315	-	-	-	-
Platoon blocked, %			-	-	-
Mov Cap-1 Maneuver	57	303	-	-	699
Mov Cap-2 Maneuver	178	-	-	-	-
Stage 1	363	-	-	-	-
Stage 2	308	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s	23.9	0	0.2
HCM LOS	C		

Minor Lane/Major Mvmt	NBT	NBRWBLn1	SBL	SBT
Capacity (veh/h)	-	-	222	699
HCM Lane V/C Ratio	-	-	0.142	0.023
HCM Control Delay (s)	-	-	23.9	10.3
HCM Lane LOS	-	-	C	B
HCM 95th %tile Q(veh)	-	-	0.5	0.1

Intersection												
Int Delay, s/veh	4.3											
Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		↕			↕		↕	↕		↕	↕	
Traffic Vol, veh/h	14	2	15	14	2	15	15	866	16	15	1008	16
Future Vol, veh/h	14	2	15	14	2	15	15	866	16	15	1008	16
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	100	-	-	100	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	92	92	92	92	92	92	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	15	2	16	15	2	16	16	941	17	16	1096	17

Major/Minor	Minor2		Minor1		Major1		Major2					
Conflicting Flow All	2128	2127	1105	2128	2127	950	1113	0	0	958	0	0
Stage 1	1137	1137	-	982	982	-	-	-	-	-	-	-
Stage 2	991	990	-	1146	1145	-	-	-	-	-	-	-
Critical Hdwy	7.12	6.52	6.22	7.12	6.52	6.22	4.12	-	-	4.12	-	-
Critical Hdwy Stg 1	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Follow-up Hdwy	3.518	4.018	3.318	3.518	4.018	3.318	2.218	-	-	2.218	-	-
Pot Cap-1 Maneuver	36	50	256	36	50	315	627	-	-	718	-	-
Stage 1	245	277	-	300	327	-	-	-	-	-	-	-
Stage 2	296	324	-	242	274	-	-	-	-	-	-	-
Platoon blocked, %								-	-	-	-	-
Mov Cap-1 Maneuver	32	48	256	31	48	315	627	-	-	718	-	-
Mov Cap-2 Maneuver	32	48	-	31	48	-	-	-	-	-	-	-
Stage 1	239	271	-	292	318	-	-	-	-	-	-	-
Stage 2	272	316	-	220	268	-	-	-	-	-	-	-

Approach	EB		WB		NB		SB	
HCM Control Delay, s	131.3		135.1		0.2		0.1	
HCM LOS	F		F					

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1WBLn1	SBL	SBT	SBR
Capacity (veh/h)	627	-	-	58	57	718	-
HCM Lane V/C Ratio	0.026	-	-	0.581	0.591	0.023	-
HCM Control Delay (s)	10.9	-	-	131.3	135.1	10.1	-
HCM Lane LOS	B	-	-	F	F	B	-
HCM 95th %tile Q(veh)	0.1	-	-	2.3	2.4	0.1	-

Intersection						
Int Delay, s/veh	0					
Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	31	0	0	29	0	0
Future Vol, veh/h	31	0	0	29	0	0
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	34	0	0	32	0	0

Major/Minor	Major1	Major2	Minor1	Minor2	Minor3
Conflicting Flow All	0	0	34	0	66
Stage 1	-	-	-	-	34
Stage 2	-	-	-	-	32
Critical Hdwy	-	-	4.12	-	6.42
Critical Hdwy Stg 1	-	-	-	-	5.42
Critical Hdwy Stg 2	-	-	-	-	5.42
Follow-up Hdwy	-	-	2.218	-	3.518
Pot Cap-1 Maneuver	-	-	1578	-	939
Stage 1	-	-	-	-	988
Stage 2	-	-	-	-	991
Platoon blocked, %	-	-	-	-	-
Mov Cap-1 Maneuver	-	-	1578	-	939
Mov Cap-2 Maneuver	-	-	-	-	939
Stage 1	-	-	-	-	988
Stage 2	-	-	-	-	991

Approach	EB	WB	NB
HCM Control Delay, s	0	0	0
HCM LOS			A

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	-	-	-	1578	-
HCM Lane V/C Ratio	-	-	-	-	-
HCM Control Delay (s)	0	-	-	0	-
HCM Lane LOS	A	-	-	A	-
HCM 95th %tile Q(veh)	-	-	-	0	-

Intersection												
Int Delay, s/veh	0											
Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		↕			↕			↕			↕	
Traffic Vol, veh/h	0	33	0	0	31	0	0	0	0	0	0	0
Future Vol, veh/h	0	33	0	0	31	0	0	0	0	0	0	0
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Free	Free	Stop	Stop	Stop	Stop	Stop	Stop
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	-	-	-	-	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	92	92	92	92	92	92	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	0	36	0	0	34	0	0	0	0	0	0	0

Major/Minor	Major1			Major2			Minor1			Minor2		
Conflicting Flow All	34	0	0	36	0	0	70	70	36	70	70	34
Stage 1	-	-	-	-	-	-	36	36	-	34	34	-
Stage 2	-	-	-	-	-	-	34	34	-	36	36	-
Critical Hdwy	4.12	-	-	4.12	-	-	7.12	6.52	6.22	7.12	6.52	6.22
Critical Hdwy Stg 1	-	-	-	-	-	-	6.12	5.52	-	6.12	5.52	-
Critical Hdwy Stg 2	-	-	-	-	-	-	6.12	5.52	-	6.12	5.52	-
Follow-up Hdwy	2.218	-	-	2.218	-	-	3.518	4.018	3.318	3.518	4.018	3.318
Pot Cap-1 Maneuver	1578	-	-	1575	-	-	922	821	1037	922	821	1039
Stage 1	-	-	-	-	-	-	980	865	-	982	867	-
Stage 2	-	-	-	-	-	-	982	867	-	980	865	-
Platoon blocked, %	-	-	-	-	-	-	-	-	-	-	-	-
Mov Cap-1 Maneuver	1578	-	-	1575	-	-	922	821	1037	922	821	1039
Mov Cap-2 Maneuver	-	-	-	-	-	-	922	821	-	922	821	-
Stage 1	-	-	-	-	-	-	980	865	-	982	867	-
Stage 2	-	-	-	-	-	-	982	867	-	980	865	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	0	0	0	0
HCM LOS			A	A

Minor Lane/Major Mvmt	NBLn1	EBL	EBT	EBR	WBL	WBT	WBR	SBLn1
Capacity (veh/h)	-	1578	-	-	1575	-	-	-
HCM Lane V/C Ratio	-	-	-	-	-	-	-	-
HCM Control Delay (s)	0	0	-	-	0	-	-	0
HCM Lane LOS		A	A	-	-	A	-	A
HCM 95th %tile Q(veh)	-	0	-	-	0	-	-	-

Intersection						
Int Delay, s/veh	0.5					
Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations	↔		↔		↔	↔
Traffic Vol, veh/h	19	20	853	7	7	814
Future Vol, veh/h	19	20	853	7	7	814
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	-	-	-	100	-
Veh in Median Storage, #	0	-	0	-	-	0
Grade, %	0	-	0	-	-	0
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	21	22	927	8	8	885

Major/Minor	Minor1	Major1	Major2		
Conflicting Flow All	1832	931	0	0	935
Stage 1	931	-	-	-	-
Stage 2	901	-	-	-	-
Critical Hdwy	6.42	6.22	-	-	4.12
Critical Hdwy Stg 1	5.42	-	-	-	-
Critical Hdwy Stg 2	5.42	-	-	-	-
Follow-up Hdwy	3.518	3.318	-	-	2.218
Pot Cap-1 Maneuver	84	324	-	-	732
Stage 1	384	-	-	-	-
Stage 2	396	-	-	-	-
Platoon blocked, %			-	-	-
Mov Cap-1 Maneuver	83	324	-	-	732
Mov Cap-2 Maneuver	215	-	-	-	-
Stage 1	384	-	-	-	-
Stage 2	392	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s	21.5	0	0.1
HCM LOS	C		

Minor Lane/Major Mvmt	NBT	NBRWBLn1	SBL	SBT
Capacity (veh/h)	-	-	260	732
HCM Lane V/C Ratio	-	-	0.163	0.01
HCM Control Delay (s)	-	-	21.5	10
HCM Lane LOS	-	-	C	A
HCM 95th %tile Q(veh)	-	-	0.6	0

Intersection												
Int Delay, s/veh	3.2											
Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		↕			↕		↕	↕		↕	↕	
Traffic Vol, veh/h	14	2	14	24	2	24	5	815	8	8	833	5
Future Vol, veh/h	14	2	14	24	2	24	5	815	8	8	833	5
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	100	-	-	100	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	95	95	95	95	95	95	95	95	95	95	95	92
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	15	2	15	25	2	25	5	858	8	8	877	5

Major/Minor	Minor2		Minor1		Major1		Major2					
Conflicting Flow All	1782	1772	880	1776	1770	862	882	0	0	866	0	0
Stage 1	896	896	-	872	872	-	-	-	-	-	-	-
Stage 2	886	876	-	904	898	-	-	-	-	-	-	-
Critical Hdwy	7.12	6.52	6.22	7.12	6.52	6.22	4.12	-	-	4.12	-	-
Critical Hdwy Stg 1	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Follow-up Hdwy	3.518	4.018	3.318	3.518	4.018	3.318	2.218	-	-	2.218	-	-
Pot Cap-1 Maneuver	64	83	346	64	83	355	767	-	-	777	-	-
Stage 1	335	359	-	345	368	-	-	-	-	-	-	-
Stage 2	339	367	-	331	358	-	-	-	-	-	-	-
Platoon blocked, %								-	-	-	-	-
Mov Cap-1 Maneuver	58	82	346	59	82	355	767	-	-	777	-	-
Mov Cap-2 Maneuver	58	82	-	59	82	-	-	-	-	-	-	-
Stage 1	333	355	-	343	365	-	-	-	-	-	-	-
Stage 2	311	364	-	312	354	-	-	-	-	-	-	-

Approach	EB		WB		NB		SB	
HCM Control Delay, s	58.3		75.4		0.1		0.1	
HCM LOS	F		F					

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1WBLn1	SBL	SBT	SBR
Capacity (veh/h)	767	-	-	98	100	777	-
HCM Lane V/C Ratio	0.007	-	-	0.322	0.526	0.011	-
HCM Control Delay (s)	9.7	-	-	58.3	75.4	9.7	-
HCM Lane LOS	A	-	-	F	F	A	-
HCM 95th %tile Q(veh)	0	-	-	1.2	2.4	0	-

Intersection						
Int Delay, s/veh	1.8					
Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	10	4	0	28	11	0
Future Vol, veh/h	10	4	0	28	11	0
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	11	4	0	30	12	0

Major/Minor	Major1	Major2	Minor1		
Conflicting Flow All	0	0	15	0	43
Stage 1	-	-	-	-	13
Stage 2	-	-	-	-	30
Critical Hdwy	-	-	4.12	-	6.42
Critical Hdwy Stg 1	-	-	-	-	5.42
Critical Hdwy Stg 2	-	-	-	-	5.42
Follow-up Hdwy	-	-	2.218	-	3.518
Pot Cap-1 Maneuver	-	-	1603	-	968
Stage 1	-	-	-	-	1010
Stage 2	-	-	-	-	993
Platoon blocked, %	-	-	-	-	-
Mov Cap-1 Maneuver	-	-	1603	-	968
Mov Cap-2 Maneuver	-	-	-	-	968
Stage 1	-	-	-	-	1010
Stage 2	-	-	-	-	993

Approach	EB	WB	NB
HCM Control Delay, s	0	0	8.8
HCM LOS			A

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	968	-	-	1603	-
HCM Lane V/C Ratio	0.012	-	-	-	-
HCM Control Delay (s)	8.8	-	-	0	-
HCM Lane LOS	A	-	-	A	-
HCM 95th %tile Q(veh)	0	-	-	0	-

Intersection												
Int Delay, s/veh	2.9											
Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		↕			↕			↕			↕	
Traffic Vol, veh/h	3	12	3	0	30	0	10	0	0	0	0	10
Future Vol, veh/h	3	12	3	0	30	0	10	0	0	0	0	10
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Free	Free	Stop	Stop	Stop	Stop	Stop	Stop
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	-	-	-	-	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	92	92	92	92	92	92	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	3	13	3	0	33	0	11	0	0	0	0	11

Major/Minor	Major1			Major2			Minor1			Minor2		
Conflicting Flow All	33	0	0	16	0	0	60	54	15	54	55	33
Stage 1	-	-	-	-	-	-	21	21	-	33	33	-
Stage 2	-	-	-	-	-	-	39	33	-	21	22	-
Critical Hdwy	4.12	-	-	4.12	-	-	7.12	6.52	6.22	7.12	6.52	6.22
Critical Hdwy Stg 1	-	-	-	-	-	-	6.12	5.52	-	6.12	5.52	-
Critical Hdwy Stg 2	-	-	-	-	-	-	6.12	5.52	-	6.12	5.52	-
Follow-up Hdwy	2.218	-	-	2.218	-	-	3.518	4.018	3.318	3.518	4.018	3.318
Pot Cap-1 Maneuver	1579	-	-	1602	-	-	936	837	1065	944	836	1041
Stage 1	-	-	-	-	-	-	998	878	-	983	868	-
Stage 2	-	-	-	-	-	-	976	868	-	998	877	-
Platoon blocked, %	-	-	-	-	-	-	-	-	-	-	-	-
Mov Cap-1 Maneuver	1579	-	-	1602	-	-	925	835	1065	942	834	1041
Mov Cap-2 Maneuver	-	-	-	-	-	-	925	835	-	942	834	-
Stage 1	-	-	-	-	-	-	996	876	-	981	868	-
Stage 2	-	-	-	-	-	-	966	868	-	996	875	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	1.2	0	8.9	8.5
HCM LOS			A	A

Minor Lane/Major Mvmt	NBLn1	EBL	EBT	EBR	WBL	WBT	WBR	SBLn1
Capacity (veh/h)	925	1579	-	-	1602	-	-	1041
HCM Lane V/C Ratio	0.012	0.002	-	-	-	-	-	0.01
HCM Control Delay (s)	8.9	7.3	0	-	0	-	-	8.5
HCM Lane LOS	A	A	A	-	A	-	-	A
HCM 95th %tile Q(veh)	0	0	-	-	0	-	-	0

Intersection						
Int Delay, s/veh	0.5					
Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations	↔		↔		↔	↔
Traffic Vol, veh/h	18	17	905	21	20	1002
Future Vol, veh/h	18	17	905	21	20	1002
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	-	-	-	100	-
Veh in Median Storage, #	0	-	0	-	-	0
Grade, %	0	-	0	-	-	0
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	20	18	984	23	22	1089

Major/Minor	Minor1	Major1	Major2		
Conflicting Flow All	2129	996	0	0	1007
Stage 1	996	-	-	-	-
Stage 2	1133	-	-	-	-
Critical Hdwy	6.42	6.22	-	-	4.12
Critical Hdwy Stg 1	5.42	-	-	-	-
Critical Hdwy Stg 2	5.42	-	-	-	-
Follow-up Hdwy	3.518	3.318	-	-	2.218
Pot Cap-1 Maneuver	55	297	-	-	688
Stage 1	357	-	-	-	-
Stage 2	307	-	-	-	-
Platoon blocked, %			-	-	-
Mov Cap-1 Maneuver	53	297	-	-	688
Mov Cap-2 Maneuver	172	-	-	-	-
Stage 1	357	-	-	-	-
Stage 2	297	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s	25.2	0	0.2
HCM LOS	D		

Minor Lane/Major Mvmt	NBT	NBRWBLn1	SBL	SBT
Capacity (veh/h)	-	-	216	688
HCM Lane V/C Ratio	-	-	0.176	0.032
HCM Control Delay (s)	-	-	25.2	10.4
HCM Lane LOS	-	-	D	B
HCM 95th %tile Q(veh)	-	-	0.6	0.1

Intersection												
Int Delay, s/veh	6.9											
Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		↕			↕		↕	↕		↕	↕	
Traffic Vol, veh/h	14	2	15	20	2	20	15	871	25	24	1020	16
Future Vol, veh/h	14	2	15	20	2	20	15	871	25	24	1020	16
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop	Free	Free	Free	Free	Free	Free
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	100	-	-	100	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	92	92	92	92	92	92	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	15	2	16	22	2	22	16	947	27	26	1109	17

Major/Minor	Minor2		Minor1		Major1		Major2					
Conflicting Flow All	2175	2176	1118	2172	2171	961	1126	0	0	974	0	0
Stage 1	1170	1170	-	993	993	-	-	-	-	-	-	-
Stage 2	1005	1006	-	1179	1178	-	-	-	-	-	-	-
Critical Hdwy	7.12	6.52	6.22	7.12	6.52	6.22	4.12	-	-	4.12	-	-
Critical Hdwy Stg 1	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Critical Hdwy Stg 2	6.12	5.52	-	6.12	5.52	-	-	-	-	-	-	-
Follow-up Hdwy	3.518	4.018	3.318	3.518	4.018	3.318	2.218	-	-	2.218	-	-
Pot Cap-1 Maneuver	33	46	252	34	47	311	620	-	-	708	-	-
Stage 1	235	267	-	296	323	-	-	-	-	-	-	-
Stage 2	291	319	-	232	265	-	-	-	-	-	-	-
Platoon blocked, %								-	-	-	-	-
Mov Cap-1 Maneuver	28	43	252	29	44	311	620	-	-	708	-	-
Mov Cap-2 Maneuver	28	43	-	29	44	-	-	-	-	-	-	-
Stage 1	229	257	-	288	315	-	-	-	-	-	-	-
Stage 2	262	311	-	207	255	-	-	-	-	-	-	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	163	207	0.2	0.2
HCM LOS	F	F		

Minor Lane/Major Mvmt	NBL	NBT	NBR	EBLn1WBLn1	SBL	SBT	SBR
Capacity (veh/h)	620	-	-	51	53	708	-
HCM Lane V/C Ratio	0.026	-	-	0.661	0.861	0.037	-
HCM Control Delay (s)	11	-	-	163	207	10.3	-
HCM Lane LOS	B	-	-	F	F	B	-
HCM 95th %tile Q(veh)	0.1	-	-	2.6	3.7	0.1	-

Intersection						
Int Delay, s/veh	0.7					
Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	31	10	0	29	6	0
Future Vol, veh/h	31	10	0	29	6	0
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	34	11	0	32	7	0

Major/Minor	Major1	Major2	Minor1	Minor2	Minor3
Conflicting Flow All	0	0	45	0	72
Stage 1	-	-	-	-	40
Stage 2	-	-	-	-	32
Critical Hdwy	-	-	4.12	-	6.42
Critical Hdwy Stg 1	-	-	-	-	5.42
Critical Hdwy Stg 2	-	-	-	-	5.42
Follow-up Hdwy	-	-	2.218	-	3.518
Pot Cap-1 Maneuver	-	-	1563	-	932
Stage 1	-	-	-	-	982
Stage 2	-	-	-	-	991
Platoon blocked, %	-	-	-	-	-
Mov Cap-1 Maneuver	-	-	1563	-	932
Mov Cap-2 Maneuver	-	-	-	-	932
Stage 1	-	-	-	-	982
Stage 2	-	-	-	-	991

Approach	EB	WB	NB
HCM Control Delay, s	0	0	8.9
HCM LOS			A

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	932	-	-	1563	-
HCM Lane V/C Ratio	0.007	-	-	-	-
HCM Control Delay (s)	8.9	-	-	0	-
HCM Lane LOS	A	-	-	A	-
HCM 95th %tile Q(veh)	0	-	-	0	-

Intersection												
Int Delay, s/veh	1.8											
Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		↕			↕			↕			↕	
Traffic Vol, veh/h	9	33	9	0	31	0	6	0	0	0	0	5
Future Vol, veh/h	9	33	9	0	31	0	6	0	0	0	0	5
Conflicting Peds, #/hr	0	0	0	0	0	0	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Free	Free	Stop	Stop	Stop	Stop	Stop	Stop
RT Channelized	-	-	None	-	-	None	-	-	None	-	-	None
Storage Length	-	-	-	-	-	-	-	-	-	-	-	-
Veh in Median Storage, #	-	0	-	-	0	-	-	0	-	-	0	-
Grade, %	-	0	-	-	0	-	-	0	-	-	0	-
Peak Hour Factor	92	92	92	92	92	92	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	10	36	10	0	34	0	7	0	0	0	0	5

Major/Minor	Major1		Major2		Minor1			Minor2				
Conflicting Flow All	34	0	0	46	0	0	98	95	41	95	100	34
Stage 1	-	-	-	-	-	-	61	61	-	34	34	-
Stage 2	-	-	-	-	-	-	37	34	-	61	66	-
Critical Hdwy	4.12	-	-	4.12	-	-	7.12	6.52	6.22	7.12	6.52	6.22
Critical Hdwy Stg 1	-	-	-	-	-	-	6.12	5.52	-	6.12	5.52	-
Critical Hdwy Stg 2	-	-	-	-	-	-	6.12	5.52	-	6.12	5.52	-
Follow-up Hdwy	2.218	-	-	2.218	-	-	3.518	4.018	3.318	3.518	4.018	3.318
Pot Cap-1 Maneuver	1578	-	-	1562	-	-	884	795	1030	888	790	1039
Stage 1	-	-	-	-	-	-	950	844	-	982	867	-
Stage 2	-	-	-	-	-	-	978	867	-	950	840	-
Platoon blocked, %	-	-	-	-	-	-	-	-	-	-	-	-
Mov Cap-1 Maneuver	1578	-	-	1562	-	-	874	789	1030	884	784	1039
Mov Cap-2 Maneuver	-	-	-	-	-	-	874	789	-	884	784	-
Stage 1	-	-	-	-	-	-	943	838	-	975	867	-
Stage 2	-	-	-	-	-	-	973	867	-	943	834	-

Approach	EB	WB	NB	SB
HCM Control Delay, s	1.3	0	9.2	8.5
HCM LOS			A	A

Minor Lane/Major Mvmt	NBLn1	EBL	EBT	EBR	WBL	WBT	WBR	SBLn1
Capacity (veh/h)	874	1578	-	-	1562	-	-	1039
HCM Lane V/C Ratio	0.007	0.006	-	-	-	-	-	0.005
HCM Control Delay (s)	9.2	7.3	0	-	0	-	-	8.5
HCM Lane LOS	A	A	A	-	A	-	-	A
HCM 95th %tile Q(veh)	0	0	-	-	0	-	-	0

Record 1 of 1 Goto Record

Location ID	63-5139	MPO ID	50455
Type	SPOT	HPMS ID	1 4 125 048
On NHS	No	On HPMS	Yes
LR\$ ID	0644004	LR\$ Loc Pt	2.975
SF Group	Urban Non State	Route Type	
AF Group	NoFactor	Route	
GF Group	Urban Non State	Active	Yes
Class Dist Grp	NTL_4	Category	Primary
Seas Class Grp			
WIM Group			
QC Group	Default		
Fncrl Class	(4) Minor Arterial	Milepost	
Located On	COOLIDGE HWY		
Loc On Alias			
	100 FEET S OF 11 MILE		

More Detail

STATION DATA

Directions: 2-WAY NB SB

AADT

Year	AADT	DHV-30	K %	D %	PA	BC	Src
2022	20,239	1,859	9	53	19,852 (98%)	387 (2%)	
2021	22,368 ³		9	54	21,318 (95%)	1,050 (5%)	Grown from 2020
2020	19,631 ³		9	54	18,687 (95%)	944 (5%)	Grown from 2019
2019	22,987	2,125	9	54	22,554 (98%)	433 (2%)	
2018	23,242 ³		7	65	22,616 (97%)	626 (3%)	Grown from 2017

1-5 of 7

VOLUME COUNT

Date	Int	Total
Wed 10/19/2022	15	20,716
Tue 10/18/2022	15	19,759
Tue 6/11/2019	15	22,987
Tue 12/6/2016	60	22,327

VOLUME TREND

Year	Annual Growth
2022	-10%
2021	14%
2020	-15%
2019	-1%



Location Info	
Location ID	63-5139_NB
County ID	63
Station ID	9_NB
Type	I-SECTION
Functional Class	4
Located On	COOLIDGE HWY
	100 FEET S OF 11 MILE
Direction	NB
Community	Oak Park
MPO_ID	58453
HPMS ID	1_4_125_048
Agency	Michigan Department of Transportation

Count Data Info	
Start Date	10/19/2022
End Date	10/20/2022
Start Time	12:00 PM
End Time	12:00 PM
Direction	NB
Notes	
Count Source	63-5139
File Name	63-5139_1003382_10-18-2022.prn
Weather	
Study	
Owner	brownv22
QC Status	Accepted

Interval: 15 mins					
Time	15 Min				Hourly Count
	1st	2nd	3rd	4th	
00:00 - 01:00	13	21	6	4	44
01:00 - 02:00	7	5	2	2	16
02:00 - 03:00	4	5	3	5	17
03:00 - 04:00	1	3	4	7	15
04:00 - 05:00	8	7	12	9	36
05:00 - 06:00	18	16	36	33	103
06:00 - 07:00	44	46	67	111	268
07:00 - 08:00	104	125	171	215	615
08:00 - 09:00	245	165	188	167	765
09:00 - 10:00	152	148	142	146	588
10:00 - 11:00	143	133	163	134	573
11:00 - 12:00	153	139	140	161	593
12:00 - 13:00	175	124	171	159	629
13:00 - 14:00	154	169	140	170	633
14:00 - 15:00	139	182	181	194	696
15:00 - 16:00	208	221	234	208	871
16:00 - 17:00	211	224	213	205	853
17:00 - 18:00	244	217	204	201	866
18:00 - 19:00	192	175	187	165	719
19:00 - 20:00	170	124	96	85	475
20:00 - 21:00	86	86	85	57	314
21:00 - 22:00	53	58	43	38	192
22:00 - 23:00	35	40	23	26	124
23:00 - 24:00	28	21	12	12	73
TOTAL					10078

Location Info	
Location ID	63-5139_SB
County ID	63
Station ID	9_SB
Type	I-SECTION
Functional Class	4
Located On	COOLIDGE HWY
	100 FEET S OF 11 MILE
Direction	SB
Community	Oak Park
MPO_ID	58454
HPMS ID	1_4_125_048
Agency	Michigan Department of Transportation

Count Data Info	
Start Date	10/19/2022
End Date	10/20/2022
Start Time	12:00 PM
End Time	12:00 PM
Direction	SB
Notes	
Count Source	63-5139
File Name	63-5139_1003382_10-18-2022.prn
Weather	
Study	
Owner	brownv22
QC Status	Accepted

Interval: 15 mins					
Time	15 Min				Hourly Count
	1st	2nd	3rd	4th	
00:00 - 01:00	15	18	5	8	46
01:00 - 02:00	9	9	8	9	35
02:00 - 03:00	5	4	1	4	14
03:00 - 04:00	2	2	4	8	16
04:00 - 05:00	4	3	7	14	28
05:00 - 06:00	15	13	21	28	77
06:00 - 07:00	39	50	70	74	233
07:00 - 08:00	92	133	167	228	620
08:00 - 09:00	223	200	160	174	757
09:00 - 10:00	117	134	124	154	529
10:00 - 11:00	113	93	115	135	456
11:00 - 12:00	116	133	148	164	561
12:00 - 13:00	157	171	147	156	631
13:00 - 14:00	173	175	160	162	670
14:00 - 15:00	133	143	180	197	653
15:00 - 16:00	215	242	248	276	981
16:00 - 17:00	235	215	217	249	916
17:00 - 18:00	240	240	237	276	993
18:00 - 19:00	251	197	179	163	790
19:00 - 20:00	177	177	144	141	639
20:00 - 21:00	124	137	96	81	438
21:00 - 22:00	93	78	58	63	292
22:00 - 23:00	55	34	43	37	169
23:00 - 24:00	29	23	26	18	96
TOTAL					10640



March 13, 2025

City of Berkley, MI
 Community Development
 3338 Coolidge Hwy.
 Berkley, MI 48072

Re: PPUD-01-25 The Columbia PUD Amendment - Review #1

Thank you for the review of PUD Amendment for "The Columbia" project dated "02.13.2025 Revised PUD". Below are responses to your March 3, 2025 review letter. All responses will be cross referenced with revised documents dated "03.13.2025 Revised PUD - Rev. #1".

Department of Public Works (Shawn Young):

1. The site plans will be reviewed by the City’s engineering consultant, Hubbell, Roth & Clark (HRC). Among other things, HRC will review the storm water calculations and grading.
 - a. Noted

2. The existing 6” water main on Columbia from the 12” watermain in Coolidge to just past the planned construction limits shall be replaced with new 8’ water main to support the fire flow needs of the structure and limit the potential for future disruptions to the building. This work will require an EGLE Permit.
 - a. The underground water lines being pulled from Cambridge not Columbia. Water main sizes and water pressure (flow test) will be confirmed during the construction document phase of the project.

3. More information such as a geotechnical report and water table levels are needed before approval of the proposed stormwater detentions system is approved.
 - a. The geotechnical report and soil borings have not be completed yet. All information pertaining to the soil conditions, water table, bearing capacity, etc. will be provided when the construction drawings are submitted for building permits.

4. A traffic control plan shall be added to the plan set to account for any proposed Right of Way impacts. This includes any potential sidewalk closures during construction.
 - a. Please refer to the attached Traffic Impact Analysis from the originally approved PUD. The revised PUD plans have reduced the number of dwelling units from 57 to 51. Thus, the number of trips will decrease with the proposed reduction in units. Though a full updated Traffic Impact Analysis has not been completed, the peak AM and PM trips schedule has been updated. Please see below.

Originally Approved PUD:

Type	Use	ITE Land Use Code	Size	Units	Weekday Trips	AM Peak-Hour Trips			PM Peak-Hour Trips		
						In	Out	Total	In	Out	Total
Proposed	Multifamily Housing (Low-Rise)	220	57	DU	441	10	31	41	28	17	45
	Total Trips					441	10	31	41	28	17
Code Compliant	Retail	822	5,760	SF	473	12	8	20	26	27	53
	Office	712	3,150	SF	45	4	1	5	2	5	7
	Multifamily Housing (Low-Rise)	220	12	DU	152	6	21	27	16	10	26
	Total Trips					670	22	30	52	44	42
Difference between Proposed and Code Compliant Uses					-229	-12	1	-11	-16	-25	-41

Proposed PUD Amendment:

Type	Use	ITE Land Use Code	Size	Units	Weekday Trips	AM Peak-Hour Trips			PM Peak-Hour Trips		
						In	Out	Total	In	Out	Total
Proposed (REVISED)	Multifamily Housing (Low-Rise)	220	51	DU	402	9	30	39	27	15	42
	Total Trips					402	9	30	39	27	15
Code Compliant	Retail	822	5,760	SF	473	12	8	20	26	27	53
	Office	712	3,150	SF	45	4	1	5	2	5	7
	Multifamily Housing (Low-Rise)	220	12	DU	152	6	21	27	16	10	26
	Total Trips					670	22	30	52	44	42
Difference between Proposed and Code Compliant Uses					-268	-13	0	-13	-17	-27	-44

Engineering Department (Edward D. Zmich):

1. The number of parking spaces shown does not meet the ordinance requirements of 2 per residential unit. We will defer to Community Development to discuss the possibility of an exception to the parking requirements. This item is still applicable.
 - a. The originally approved PUD contained 57 dwelling units and 77 parking spaces. Providing a 1.351 parking ratio. The proposed plans contain 51 dwelling units and 69 parking spaces. Providing a 1.353 parking ratio maintaining the originally approved parking ratio.

2. The existing water and sewer leads are to be abandoned and new leads will be constructed. The sanitary leads must be abandoned via a spot liner or another DPW approved method, within 2 feet of the main. Consult with the DPW prior to abandonment of existing leads. This note has been added to the plans. This item has been satisfactorily addressed.
 - a. **Noted**

3. The proposed sewer leads must include a new connection (TwisTee sewer saddle, as per the City DPW, or approved equal). The Applicant is responsible for any roadwork and restoration associated with the new utility connections which must be shown on the plans. The DPW must be contacted prior to the commencement of work within the right-of-way (ROW). This note has been added to the plans. This item has been satisfactorily addressed.
 - a. **Noted**

4. The Grading Plan shows that stormwater will be contained within the site and directed towards the proposed underground storage system. The site grading appears satisfactory.
 - a. **Noted**

5. Stormwater runoff calculations are provided for a 100-year storm event in accordance with Oakland County standards. The proposed underground storage system volume exceeds the required detention volume according to these calculations and the provided details of the storage system. This item is satisfactory.
 - a. **Noted**

6. A restricted outlet structure is proposed along the outlet pipe from the underground storage system to the city sewer main. The minimum restrictor size is 1 inch as per OCWRC, if the weir outlet design is to be used.
 - a. Final design and review of the stormwater outlet control structure will take place during the construction document phase.

7. Note that downspouts are not permitted to discharge directly into the combined sewer system and must be directed onto grass, landscape or other green space area. They may also be directed through the proposed restricted-outlet structure. The location of the proposed downspouts and the above note must be shown on the plans.
 - a. No downspouts are proposed. The flat roof will drain via roof sumps down the building to underground header system and connect to the u/g detention system.
8. Further details must be provided for full engineering approval, including all pavement cross sections and utility connections. The pavement cross section details must include a detail showing that the depth of cover above the underground storage system matches the manufacturer requirements. This item is still applicable.
 - a. Full details will be provided on the final construction documents for review and approval.
9. A traffic control plan will be required prior to full engineering site plan approval. This item is still applicable.
 - a. A traffic control plan will be provided within the final set of construction documents for review and approval.
10. A profile view of all utilities, including how and what is connected to the underground stormwater storage area, must be included on the plans.
 - a. All required profiles for utilities will be provided within the final set of construction documents for review and approval.
11. Details of the connections to the Aquaswirl structure must be shown on the plans.
 - a. Complete details for all stormwater structures and facilities will be provided with the final set of construction documents for review and approval.
12. A geotechnical investigation is recommended to evaluate the feasibility of the proposed stormwater management system. The report and soil logs should be submitted along with the plans, including the elevation of the groundwater table, soil types encountered, and the design recommendations or comments on the proposed stormwater collection system.
 - a. The geotechnical report and soil borings have not be completed yet. All information pertaining to the soil conditions, water table, bearing capacity, etc. will be provided when the construction drawings are submitted for building permits.
13. The developer will be required to prepare and enter into a perpetuity maintenance agreement with the City for the proposed private stormwater systems. The Applicant must contact the City DPW regarding this item prior to commencing construction.
 - a. A Stormwater Maintenance Agreement will be provided to the city for review and approval during the final construction document review period.

Department of Community Development (Kristen Kapelanski):

We are providing responses to only the items that require them from Kristen K.'s review letter.

Proposed Amendments to original PUD:

1. Conversion of the mansard roof into a flat deck roof. Height per the Zoning Ordinance is measured to the mid-point of a mansard roof and the top of a flat roof. In the original PUD, the top of the mansard roof was labeled as 45 ft. with a midpoint of 40 ft., the maximum allowed height. Since a flat top roof is measured differently, with a proposed height of 46 ft., this will require a deviation. Parapets are also

proposed for visual interest and screening. Those are not included in the overall height measurements. See the applicant's February 14, 2025 narrative for additional information.

- a. Please see sheet **A.200** for the dimensions being requested. The top of roof height is 46'-0", the standard parapet is 47'-0", and feature elements at the NW and SW corner of the building (facing Coolidge) have a maximum proposed height of 50'-0"
2. The façade has been updated to have similar materials but with a different color palate. Cement board siding has been added as an accent material on the east, north and south elevations. Siding can be permitted by the Planning Commission if the Commission finds that the standards in Section 138-678 have been met.
 - a. While the original white/cream color palette is attractive and modern, we feel that the reddish/brown brick being proposed will fit in better with the surrounding buildings on Coolidge. We feel like the addition of cement board siding will create a seamless transition from the businesses on Coolidge to the single-family residences to the east.

Proposed Deviations from the Zoning Ordinance:

1. Deficient use (Non-residential is not provided on the first floor.)
 - a. This remains consistent with the originally approved PUD plans.
2. Deficient use (The southernmost parcel contains a public park space/plaza and parking for the proposed multifamily building. Parking and a park are not permitted uses in the Gateway Zoning District.)
 - a. Although this is a deficient use for the southern lot, we feel that the benefits of the proposed project (one building, 6 less units, reduction in lot coverage, increased landscaping, larger pocket park) should be considered.
3. Deficient front setback -west (10 ft. required, 0.5 ft. provided)
 - a. The original PUD front (West) setback was 2'-0 1/8" to the balconies (5'-3 3/4" to the first floor building line). The proposed front setback at the featured NW and SW corners of the building is 0'-0" though between them there is a 2'-0" setback proposed. This is to allow for landscaping, benches, and trash cans as the original PUD intended for a public benefit to Coolidge and to help screen the podium parking from view.
4. Deficient building height (40 ft. required, 46 ft. provided)
 - a. The original PUD plans had sloped walls on floor 4 in order to comply with the ordinance definition of a mansard roof and therefore be allowed to measure the building height from the midpoint of the slope. Though, the top of the mansard was a flat roof with a height of 45'-0" and 1' parapet at 46'-0", as shown in the original plans. The proposed building removed the sloped 4th floor walls and has the flat portion of the roof at 46'-0" with a 1' parapet at 47'-0" this is 1' taller than the original PUD.
5. Deficient number of parking spaces (102 required, 69 provided)
 - a. The originally approved PUD contained 57 dwelling units and 77 parking spaces. Providing a 1.351 parking ratio. The proposed plans contain 51 dwelling units and 69 parking spaces. Providing a 1.353 parking ratio maintaining the originally approved parking ratio.
6. Deficient number of compact car spaces (30% permitted, 35% proposed)
 - a. The originally approved PUD allowed 36% compact parking spaces. The proposed PUD amendment contains 35% compact parking spaces.
7. Deficient use (Accessory structure – carports- located on a parcel without a principal use.)
 - a. See response #2 above
8. Deficient parking location (Off-street parking facilities must be located on the same parcel as the principal use. Parking proposed on southern parcel.)
 - a. See response #2 above

Items to be Addressed:

1. Three barrier free spaces are required. One additional barrier free space must be added to the north parking lot.
 - a. Per section 1106.2(1-4) of the MBC 2015, barrier free parking spaces for an R-2 use are required for all Type A dwelling units. Per section 1107.6.2.2.1 of the MBC 2015, we will be providing 2 Type A dwelling units. Therefore only 2 barrier free parking spaces are required.
2. A screen wall is indicated along the east property line. A detail matching the height of the screen wall included in the current approved plan and indicating masonry to match the building should be included in the plan set.
 - a. Please see the detail added to sheet **A.202** for the screenwall.
3. A photometric plan complying with ordinance standards must be provided prior to the Planning Commission meeting.
 - a. Please see sheet **1 of 1** for the revised photometric plans.
4. The square footage of the previously approved public park/plaza along with the square footage of the currently proposed public park/plaza should be provided.
 - a. The original pocket park was 3,070 sq.ft. The new proposed pocket park is 5,470 sq.ft. which is roughly 178% larger than the originally approved PUD.
5. Material samples should be brought to the Planning Commission meeting.
 - a. Noted
6. All mechanical rooftop units will need to be screened with metal panels if screening is not achieved via parapets.
 - a. The originally approved PUD contained condensers located on the flat roof portion of the mansard roof which were centered on the building and screened with a 1' parapet. The proposed PUD follows this same design.

PUD Recognizable Benefits (Must meet 3):

1. High-quality architectural design, beyond the site plan requirements of this title.
 - a. As mentioned in the review letter, we believe that the high-quality exterior materials, strong building design, corner balconies, activated streetfront, and increased lobby/amenity space meet the intent of this section of the ordinance and should be considered a recognizable benefit.
2. Extensive landscaping, beyond the site plan requirements of this title.
 - a. We are proposing a large pocket park on the southern property that has increased in size from the originally approved PUD (see item #4 in the "items to be addressed" section above). In addition to this, we are proposing enhanced landscaping areas East and west of the southern parking lot to screen it from public view, streetscape landscaping west of the building, and a larger landscaped area at the NW corner of the building. Lastly, we are maintaining the commitment to providing new street trees along the Coolidge streetscape/ROW and to plant landscape screening east of the masonry screenwall on the neighbor's property to help screen the project from view.
3. Preservation or enhancement of historic resources.
 - a. Not applicable
4. Provision of open space and public plazas.
 - a. As mentioned in the review letter, the pocket park, enhanced streetscape and benches/trash cans along the Coolidge ROW create usable open space that meet the intent of this section of the ordinance.
5. Efficient consolidation of poorly dimensioned parcels.
 - a. Not applicable

6. Shared vehicular access between properties or uses.
 - a. Not applicable
7. A complementary mix of uses or a variety of housing types.
 - a. The project contains a mix of studio and 1-bedroom dwelling units with elevator access to every unit to best serve the community. The units vary in size, shape, have a mix of inset/wall-hung balconies, and offer various views of the city. This will provide a variety of unit types for tenants to choose from.

Staff Recommendation:

1. A photometric plan complying with ordinance standards must be provided prior to the Planning Commission meeting.
 - a. Please see sheet **1 of 1** for the revised photometric plans.
2. The square footage of the previously approved public park/plaza along with the square footage of the currently proposed public park/plaza should be provided.
 - a. Please see response #4 under in the section "items to be addressed" above.

We are very pleased that both the Engineering Department and Community Development Department are recommending approval of this amended PUD. We are very excited to bring this project to fruition in the City of Berkley and look forward to our discussion at the 03/18 Planning Commission meeting. If you have any further comments, concerns or questions; please do not hesitate to contact me at 248-414-9270 ext. 106 or ray@kriegerklatt.com.

Thank you,

Raymond J. Phillips
Director of Design
Krieger Klatt Architects, Inc.

**THE CITY OF BERKLEY
Community Development Department
3338 Coolidge Highway, Berkley, Michigan 48072
(248) 658-3320**

**NOTICE OF PUBLIC HEARING
BERKLEY CITY PLANNING COMMISSION**

NOTICE IS HEREBY GIVEN, that in accordance with the City of Berkley Code of Ordinances, Chapter 138 *Zoning, Article VI Administration and Enforcement, Amendments*, a Public Hearing will be held by the Berkley City Planning Commission on Tuesday, March 18 at 7:00 p.m. or as near thereto as the matter may be reached at the City Hall Council Chambers, 3338 Coolidge Highway, Berkley, Michigan.

Application Number PPUD-01-25

The applicant, Krieger Klatt Architects on behalf of WJ Ventures LLC, 2465 Columbia, 2475 Columbia, 2468 Columbia and 2476 Columbia and 2475 Cambridge and 2465 Cambridge, Parcel #'s 25-17-353-001, 25-17-353-002, 25-17-355-002, 25-17-355-001, 25-17-353-016 and 25-17-353-015 is requesting an amendment to the Planned Unit Development previously approved for a multi-family development.

Complete application information is available for review at www.berkleymi.gov/community-development/development-projects.

Comments regarding the proposed site plan may be made in person on the night of the Public Hearing or may be made in writing. All written comments must be submitted in person to the Community Development Department or sent via email to planning@berkleymi.gov before 5:00 PM on the date of the Planning Commission meeting.

You can watch the meeting: youtube.com/cityofberkley

KRISTEN KAPELANSKI
COMMUNITY DEVELOPMENT DIRECTOR

**THE CITY OF BERKLEY
Community Development Department
3338 Coolidge Highway, Berkley, Michigan 48072
(248) 658-3320**

**NOTICE OF PUBLIC HEARING
BERKLEY CITY PLANNING COMMISSION**

NOTICE IS HEREBY GIVEN, that in accordance with the City of Berkley Code of Ordinances, Chapter 138 *Zoning, Article VI Administration and Enforcement, Amendments*, a Public Hearing will be held by the Berkley City Planning Commission on Tuesday, March 18 at 7:00 p.m. or as near thereto as the matter may be reached at the City Hall Council Chambers, 3338 Coolidge Highway, Berkley, Michigan.

Application Number PPUD-01-25

The applicant, Krieger Klatt Architects on behalf of WJ Ventures LLC, 2465 Columbia, 2475 Columbia, 2468 Columbia and 2476 Columbia and 2475 Cambridge and 2465 Cambridge, Parcel #'s 25-17-353-001, 25-17-353-002, 25-17-355-002, 25-17-355-001, 25-17-353-016 and 25-17-353-015 is requesting an amendment to the Planned Unit Development previously approved for a multi-family development.

Complete application information is available for review at www.berkleymi.gov/community-development/development-projects.

Comments regarding the proposed site plan may be made in person on the night of the Public Hearing or may be made in writing. All written comments must be submitted in person to the Community Development Department or sent via email to planning@berkleymi.gov before 5:00 PM on the date of the Planning Commission meeting.

You can watch the meeting: youtube.com/cityofberkley

KRISTEN KAPELANSKI
COMMUNITY DEVELOPMENT DIRECTOR

Publish Once:

Royal Oak Tribune
Royal Oak, Michigan
Friday, February 28, 2025



CITY OF BERKLEY
COMMUNITY DEVELOPMENT
3338 COOLIDGE HWY, BERKLEY, MICHIGAN 48072

MEMORANDUM

To: Krieger Klatt Architects, Applicant
From: Kristen Kapelanski, Community Development Director
Subject: **PPUD-01-25 The Columbia PUD Amendment – Review #1**
Date: February 27, 2025

Project History

The project includes 2465, 2475, 2466 and 2476 Columbia and 2475 and 2465 Cambridge. The current zoning of the site is PUD. The City Council approved a Planned Unit Development Plan for the subject property in 2024, which included a four-story multi-family development on 0.83 acres at the aforementioned addresses. Fifty-seven units were contained in two buildings with associated parking, utilities and landscaping. The Council approved the request with the following ordinance deviations and recognizing the following public benefits. (All PUD projects must meet at least three of the seven public benefits identified in Section 138-533.) In addition, the Council found that the standards for approval in Section 138-537 had been met.

Ordinance Deviations

- Deficient setback along Coolidge (10 ft. required, 2 ft. 1/8 in. provided for north building, 7 ft. 3in. provided for south building)
- Deficient number of parking spaces (114 required, 77 provided)
- Deviation to allow for an overage on the total number of compact car spaces (30% permitted, 36% provided)
- Deficient use (non-residential is not provided on the first floor)

Public Benefits

- The project provides extensive landscaping, beyond site plan requirements.
- The project provides open space or a public plaza.
- The project provides efficient consolidation of poorly dimensioned parcels.

Proposed Amendments to the Planned Unit Development

The applicant has now proposed amendments to the approved PUD. All amendments outside of those identified as being eligible for administrative approval in the approved PUD Agreement must go back through the standard PUD approval process. In this case, the applicant is also proposing to modify the proposed deviations as well.

The proposed amendments are detailed in the applicant's provided narrative and are summarized below. Since this request is for an amendment to an existing, approved PUD, the Planning Commission and City Council should focus their review on those elements of the plan that have changed.

Proposed Amendments

- The southern building has been eliminated and all units have been consolidated into one building on the northern-most parcel. The pocket park originally on the eastern half of the southern parcel has been moved to the west, fronting Coolidge. Carports are proposed as accessory structures on the southern parcel.
- Conversion of the mansard roof into a flat deck roof. Height per the Zoning Ordinance is measured to the mid-point of a mansard roof and the top of a flat roof. In the original PUD, the top of the mansard roof was labeled as 45 ft. with a midpoint of 40 ft., the maximum allowed height. Since a flat top roof is measured differently, with a proposed height of 46 ft., this will require a deviation. Parapets are also proposed for visual interest and screening. Those are not included in the overall height measurements. See the applicant's February 14, 2025 narrative for additional information.
- The first-floor lobby has been increased in size.
- The unit count has decreased from 57 to 51 units.
- Balcony locations have been added and adjusted.
- The façade has been updated to have similar materials but with a different color palate. Cement board siding has been added as an accent material on the east, north and south elevations. Siding can be permitted by the Planning Commission if the Commission finds that the standards in Section 138-678 have been met.
- The parking lot layout has been revised and the number of parking spaces has been reduced from 77 to 69. With the reduction of units, this equals a ratio of 1.35 spaces per unit. The current approved plan also proposed 1.35 spaces per unit. The parking lot reconfigurations result in a more usable parking area without the use of tandem spaces.
- Landscaping throughout the site has been adjusted to accommodate the proposed layout changes.
- The refuse area has been moved under the podium of the building.

Proposed Deviations from the Zoning Ordinance

Deviations that are proposed as part of the PUD plan are listed below. New deviations are bolded. Revised deviations are italicized.

- Deficient use (Non-residential is not provided on the first floor.)
- ***Deficient use (The southernmost parcel contains a public park space/plaza and parking for the proposed multifamily building. Parking and a park are not permitted uses in the Gateway Zoning District.)***
- *Deficient front setback -west (10 ft. required, 0.5 ft. provided)*
- ***Deficient building height (40 ft. required, 46 ft. provided)***

- *Deficient number of parking spaces (102 required, 69 provided)*
- *Deficient number of compact car spaces (30% permitted, 35% proposed)*
- ***Deficient use (Accessory structure – carports- located on a parcel without a principal use.)***
- ***Deficient parking location (Off-street parking facilities must be located on the same parcel as the principal use. Parking proposed on southern parcel.)***

Items to be Addressed

Bolded items must be addressed prior to the Planning Commission meeting. The remaining items can be conditions of approval should the Planning Commission or City Council make motions of approval.

- Three barrier free spaces are required. One additional barrier free space must be added to the north parking lot.
- A screen wall is indicated along the east property line. A detail matching the height of the screen wall included in the current approved plan and indicating masonry to match the building should be included in the plan set.
- **A photometric plan complying with ordinance standards must be provided prior to the Planning Commission meeting.**
- **The square footage of the previously approved public park/plaza along with the square footage of the currently proposed public park/plaza should be provided.**
- **Material samples should be brought to the Planning Commission meeting.**
- All mechanical rooftop units will need to be screened with metal panels if screening is not achieved via parapets.

PUD Recognizable Benefits

Section 138-533 of the Zoning Ordinance indicated that a PUD application shall demonstrate to the City that the PUD protects the integrity of the surrounding neighborhood and meets at least three of the following site design elements that could not be attained through a project designed under conventional zoning.

- High-quality architectural design, beyond the site plan requirements of this title.
 - There is visual interest created by the differing materials, inset balconies and screening panels on the first floor. The Planning Commission and City Council did not previously identify this as a recognized benefit but may want to reevaluate based on the revised elevation.
- Extensive landscaping, beyond the site plan requirements of this title.
 - The revised plan includes landscaping beyond what has been seen in recent projects, consistent with the prior approval. Additionally, and also consistent with the prior approval, the applicant will plant six new trees in the Coolidge right-of-way and provide landscaping for the properties to the east, should they be willing to accept it. The Planning Commission and City previously found that this was a recognized benefit.
- Preservation or enhancement of historic resources.
 - This does not apply and was not previously identified as a recognized benefit.

- Provision of open space and public plazas.
 - The previous plan includes streetscape improvements along Coolidge, a pocket park and associated furnishings on the southern parcel. All of these except the streetscape improvements have been included in the proposed plan. Additionally, the pocket park is more open and accessible to the public in its revised location. The Planning Commission and City Council previously found this was a recognized benefit. The applicant should consider adding the previously included streetscape elements back into the plan.
- Efficient consolidation of poorly dimensioned parcels.
 - This element has not changed. The plan includes the consolidation of three adjacent parcels. The Planning Commission and City Council did not find this as a recognizable benefit as part of the previous approval.
- Shared vehicular access between properties or uses.
 - The proposed plan changes do not offer new vehicle access between properties or uses. The Planning Commission and City Council did not previously include this in the list of recognizable benefits.
- A complementary mix of uses or a variety of housing types.
 - The conversion of three two-family homes to a multiple-family building offers a better transition from Coolidge's commercial corridor to the adjacent neighborhood. No proposed uses on the site have been changed from the previous approval. The Planning Commission and City Council did not recognize this as a benefit in the previous approval.

PUD Standards for Approval

As set forth in Section 138-537 of the Zoning Ordinance, the City shall consider the following standards when determining whether to approve, approve with conditions or deny a proposed PUD.

- A recognizable and material benefit to the ultimate users of the project and to the community, where such benefit would otherwise be unfeasible or unlikely to be achieved without application of the PUD regulations.
 - This standard was previously found to be met by the Planning Commission and City Council. As identified as part of the previously approved PUD, the Master Plan identifies the need to diversify housing choices in the corridor. These apartments offer a housing option for small households in various stages of life. The barrier-free accessibility of the units reflects a housing style that is needed in the community based on current housing availability and population forecasts. The changes proposed as part of the PUD amendment do not change the use of the property in terms of a recognizable benefit as identified here.
- The proposed type and density of use shall not result in an unreasonable increase in the need for or burden upon public services, facilities, streets and utilities.
 - In terms of parking, the applicant is proposing the same parking standard that was previously approved. The Department of Public Works and the City Engineer have not identified any deficiencies when compared to the previous plan. The proposed amendment does not alter the previous finding that this standard has been met.

- There shall be underground installation of utilities, including electricity and telephone, unless otherwise approved by the City.
 - The Department of Public Works and the City Engineer have not identified any deficiencies when compared to the previous plan. The proposed amendment does not alter the previous finding that this standard has been met.
- The proposed development shall be consistent with the public health, safety and welfare of the City.
 - This standard has been met, as the project was previously, and continues to be consistent with the housing and development goals of the Master Plan and Downtown Master Plan. The proposed amendment does not alter the previous finding that this standard has been met.
- The proposed development shall not result in an unreasonable negative economic impact on surrounding properties.
 - The Planning Commission and City Council previously found that this standard was met with the inclusion of the screen wall adjacent to the neighboring residential properties and landscaping offered to the adjacent lots. Those items are included in this amendment as well.
- The proposed development shall be consistent with the goals and policies of the Master Plan.
 - This standard was previously considered met through with a proposal that makes convenient use of a shallow property within the Coolidge commercial corridor. The intention of the Master Plan, particularly within this area, is to offer diverse housing options and improve the aesthetic character. The proposed amendments do not alter this conclusion.

Staff Recommendation

The applicant should address the following items prior to the Planning Commission meeting:

- **A photometric plan complying with ordinance standards must be provided prior to the Planning Commission meeting.**
- **The square footage of the previously approved public park/plaza along with the square footage of the currently proposed public park/plaza should be provided.**

Staff recommends approval of the proposed PUD amendment as it is consistent with the previous findings of public benefit and Section 138-537 of the Zoning Ordinance.



CITY OF BERKLEY
DEPARTMENT OF PUBLIC WORKS
3238 BACON AVE, BERKLEY, MICHIGAN 48072

Transmittal Memo

To: Kristen Kapelanski, Community Development Director (via email)

Cc: Kim Anderson, Community Development Department (via email)
Adam Wozniak, Public Works Superintendent (via email)

From: Shawn Young, Deputy City Manager for Public Services

Date: March 3rd, 2024

Subject: "The Columbia" Review #3

We have reviewed the site plans provided by the Community Development Department on February 14th, 2025. Please find our comments below:

1. The site plans will be reviewed by the City's engineering consultant, Hubbell, Roth & Clark (HRC). Among other things, HRC will review the storm water calculations and grading.
2. The existing 6" water main on Columbia from the 12" watermain in Coolidge to just past the planned construction limits shall be replaced with new 8' water main to support the fire flow needs of the structure and limit the potential for future disruptions to the building. This work will require an EGLE Permit.
3. More information such as a geotechnical report and water table levels are needed before approval of the proposed stormwater detentions system is approved.
4. A traffic control plan shall be added to the plan set to account for any proposed Right of Way impacts. This includes any potential sidewalk closures during construction.

I recommend approval pending these items.

Feel free to call with any questions or concerns. Thank you.



March 5, 2025

City of Berkley
3338 Coolidge Highway
Berkley, Michigan 48072

Attn: Ms. Kim Anderson, Zoning Administrator

Re: The Columbia
2465-2476 Columbia & 2465-2475 Cambridge
PUD Application Site Plan – Review No. 4
City of Berkley, Michigan

HRC Job No. 20230156.02

Dear Ms. Anderson:

In accordance with your request, as Consulting Engineers for the City of Berkley, our office has conducted a Site Plan review for the above referenced proposed development for compliance with the City of Berkley's engineering and site plan requirements. The plan was prepared by Giffels Webster of Birmingham, Michigan with a revision date of February 14, 2025. The scope of the project includes the demolition of three existing single-family residential buildings, garages, and all other accessory site features and the construction of a new 4-story, 51-unit apartment complex. Per the City's standards and requirements for construction, we hereby offer the following comments:

General:

1. The number of parking spaces shown does not meet the ordinance requirements of 2 per residential unit. We will defer to Community Development to discuss the possibility of an exception to the parking requirements. **This item is still applicable.**

Public & Private Utilities:

2. The existing water and sewer leads are to be abandoned and new leads will be constructed. The sanitary leads must be abandoned via a spot liner or another DPW approved method, within 2 feet of the main. Consult with the DPW prior to abandonment of existing leads. **This note has been added to the plans. This item has been satisfactorily addressed.**
3. The proposed sewer leads must include a new connection (TwisTee sewer saddle, as per the City DPW, or approved equal). The Applicant is responsible for any roadwork and restoration associated with the new utility connections which must be shown on the plans. The DPW must be contacted prior to the commencement of work within the right-of-way (ROW). **This note has been added to the plans. This item has been satisfactorily addressed.**

Storm Drainage and Detention/Sanitary Sewer:

4. The Grading Plan shows that stormwater will be contained within the site and directed towards the proposed underground storage system. **The site grading appears satisfactory.**

5. Stormwater runoff calculations are provided for a 100-year storm event in accordance with Oakland County standards. The proposed underground storage system volume exceeds the required detention volume according to these calculations and the provided details of the storage system.
This item is satisfactory.
6. A restricted outlet structure is proposed along the outlet pipe from the underground storage system to the city sewer main. The minimum restrictor size is 1 inch as per OCWRC, if the weir outlet design is to be used.
7. Note that downspouts are not permitted to discharge directly into the combined sewer system and must be directed onto grass, landscape or other green space area. They may also be directed through the proposed restricted-outlet structure. The location of the proposed downspouts and the above note must be shown on the plans.
8. Further details must be provided for full engineering approval, including all pavement cross sections and utility connections. The pavement cross section details must include a detail showing that the depth of cover above the underground storage system matches the manufacturer requirements.
This item is still applicable.
9. A traffic control plan will be required prior to full engineering site plan approval. **This item is still applicable.**
10. A profile view of all utilities, including how and what is connected to the underground stormwater storage area, must be included on the plans.
11. Details of the connections to the Aquaswirl structure must be shown on the plans.
12. A geotechnical investigation is recommended to evaluate the feasibility of the proposed stormwater management system. The report and soil logs should be submitted along with the plans, including the elevation of the groundwater table, soil types encountered, and the design recommendations or comments on the proposed stormwater collection system.
13. The developer will be required to prepare and enter into a perpetuity maintenance agreement with the City for the proposed private stormwater systems. The Applicant must contact the City DPW regarding this item prior to commencing construction.

Recommendation:

Based on our aforementioned comments, we recommend conditional approval of the proposed Site Plan, pending the submittal of the above-mentioned detail sheets and revisions.

If you have any questions or require any additional information, please contact our office.

Very truly yours,

HUBBELL, ROTH & CLARK, INC.



Edward D. Zmich
Civil Department Manager

EDZ/kab

pc: City of Berkley; Shawn Young, Kristen Kapelanski
HRC; R. Alix, K. Barauskas, File