

AGENDA
BOARD OF CITY COMMISSIONERS
September 16, 2019 AT 6:00 P.M.
COMMISSION CHAMBERS AT CITY HALL
SHAWNEE, OKLAHOMA

CALL TO ORDER

DECLARATION OF A QUORUM

INVOCATION

FLAG SALUTE

1. Citizens Participation

(A three minute limit per person)
(A twelve minute limit per topic)
2. Consider approval of Consent Agenda:
 - a. Minutes from the September 3, 2019 regular meeting.
 - b. Acknowledge the following reports and minutes:
 - License Payment Report for August 2019
 - Project Payment Report for August 2019
 - Planning Commission Minutes from the August 7, 2019 regular meeting
 - Wes Watkins Reservoir Oversight Committee from the June 6, 2019 regular meeting
 - c. Authorize staff to apply for sub-grant of Emergency Management Performance Grant funding from the Oklahoma Department of Emergency Management.
 - d. Acceptance of donation of materials in the approximate amount of \$1,500.00 for the repair of a pavilion at Lions Club Park by Mrs. Linda White.
 - e. Acceptance of donation of a metal roof in the approximate amount of \$1,500.00 for the repair of a pavilion at Lions Club Park by Indaco Metals.
 - f. Acknowledge the resignation of Marissa Lightsey from the Shawnee Library Board.
 - g. Mayor's Appointments:

Shawnee Hospital Authority
Rt. Rev. Lawrence Stasyszen, O.S.B. Expires: September 30, 2025
Reappointment

Dr. Sudhir Gupta Expires: September 30, 2025
Reappointment

Shawnee Library Board

Justin Wood 1st Full Term

Expires: June 30, 2022

Reappointment

h. Lake Lease Transfer:

TRANSFER:

Lot 5 Seck Tract, 33800 Post Office Neck

From: Duwayne and Greta Colvin

To: James F. Ruth Sr. and Susan B. Ruth 2012 Revocable Trust

3. Presentation by Animal Control to present the Pet of the Week.
4. Public hearing and consideration of an ordinance to rezone property located at 306 East 45th Street from A-1 (Rural Agricultural District) to C-3 (Highway Commercial District) for the purpose of a commercial development. Case No. P15-19, Applicant: Andrew Landes.
5. Consideration of approval of a final plat for Domino Plaza Addition, Section 2 located on the southeast corner of North Harrison Avenue and John C. Bruton Boulevard for the purpose of commercial retail development. Case No. S07-19, Applicant: Shawnee Harrison, LLC.
6. Consideration of approval of a preliminary plat for Cardinal Pointe located north of East 45th Street and immediately adjacent to the west side of the A.T.&S.F. Railroad for the purpose of single-family and commercial development. Case No. S02-19, Applicant: Landes Engineering.
7. Consider a resolution to declare certain Shawnee Police Department vehicles surplus property and authorize the sale of said items for scrap.
8. Consider a resolution to declare certain Shawnee Police Department vehicles surplus property and authorize the sale of said items at auction or disposal at the City's discretion.
9. Consider a resolution to declare a certain Shawnee Police Department vehicle surplus property and donate to the Oklahoma Baptist University Police Department or disposal at the City's discretion.
10. Consider a resolution adopting the revised Emergency Operations Plan for the City of Shawnee.
11. Acknowledge monthly Sales Tax and Budget Report.
12. New Business

(Any matter not known or which could not have been reasonably foreseen prior to the posting of the agenda)
13. Commissioners Comments

14. Adjournment

Respectfully submitted

Lisa Lasyone, CMC, City Clerk

The City of Shawnee encourages participation from its citizens in public meetings. If participation is not possible due to a disability, notify the City Clerk, in writing, at least forty-eight hours prior to the scheduled meeting and necessary accommodations will be made. (ADA 28 CFR/36)

Regular Board of Commissioners

2. a.

Meeting Date: 09/16/2019

Minutes

Submitted By: Kacie Eck, City Clerk

Department: City Clerk

Information

Title of Item for Agenda

Minutes from the September 3, 2019 regular meeting.

Attachments

Minutes

BOARD OF CITY COMMISSIONERS PROCEEDINGS
SEPTEMBER 3, 2019 AT 6:00 P.M.

The Board of City Commissioners of the City of Shawnee, County of Pottawatomie, State of Oklahoma, met in Regular Session in the Commission Chambers at City Hall, 9th and Broadway, Shawnee, Oklahoma, Tuesday, September 3, 2019 at 6:00 p.m., pursuant to notice duly posted as prescribed by law. Mayor Finley presided and called the meeting to order. Upon roll call, the following members were in attendance.

Richard Finley
Mayor

Ed Bolt
Commissioner Ward 1

Ron Gillham
Commissioner Ward 2

Absent
Commissioner Ward 3-Vice Mayor

Darren Rutherford
Commissioner Ward 4

Absent
Commissioner Ward 5

Ben Salter
Commissioner Ward 6

ABSENT: James Harrod, Mark Sehorn

INVOCATION

Don Lynch,
Emergency Management Director

FLAG SALUTE

AGENDA ITEM NO. 1:

Citizens Participation
(A three-minute limit per person)
(A twelve-minute limit per topic)

Ms. Rachel Melot spoke on behalf of schools and the Walking School Bus Committee. She advised that next week a contest for the most participation will begin. Ms. Melot thanked Mayor Finley for challenging the schools to do this and set up a reward system for participation.

Ms. Melot also spoke regarding the Blue Zones Build Environment Committee. Direct mail notifications have been sent to residents on Broadway Avenue for education on walkability and livability in communities.

AGENDA ITEM NO. 2:

Consider approval of Consent Agenda:

- a. Minutes from the August 19, 2019 regular meeting.
- b. Acknowledge the following minutes:
 - Shawnee Community Beautification Committee Minutes from the July 18, 2019 regular meeting
- c. Acknowledge the resignation of Rachael Melot from the Shawnee Civic and Cultural Development Authority Board.
- d. Mayor's Appointments:

Senior Citizens of Shawnee Board

Phyllis Crosswell 1st Full Term Expires: July 1, 2024
Appointment to new board

Ann Dowdy 1st Full Term Expires: July 1, 2024
Appointment to new board

Barbara "Bobbi" Gaglia 1st Full Term Expires: July 1, 2024
Appointment to new board

Bill Haley 1st Full Term Expires: July 1, 2024
Appointment to new board

Wanda Hill 1st Full Term Expires: July 1, 2023
Appointment to new board

Albert Rice 1st Full Term Expires: July 1, 2023
Appointment to new board

Pam Robinson 1st Full Term Expires: July 1, 2023
Appointment to new board

e. Lake Lease Transfer:

TRANSFER:

Lot 12 Eckel Tract, 15105 Eckel Road

From: Frank and Mary Sims

To: Cannon Revocable Living Trust

A motion was made by Commissioner Bolt, seconded by Commissioner Rutherford, to approve Consent Agenda Item Nos. 2 (a-e). Motion carried 5-0.

AYE: Bolt, Rutherford, Salter, Gillham, Finley

NAY: None

AGENDA ITEM NO. 3:

Presentation by Animal Control to present the Pet of the Week.

Animal Control Officers Couch and Leathers presented Titan, a male blue pit mix. Titan is one year old and friendly. His adoption fee is Ten Dollars (\$10.00) inside the City Limits.

AGENDA ITEM NO. 4:

Consideration of a budget amendment for Fund 706 Gifts and Contributions – To purchase American flag decals for certain fire trucks.

Finance Director Ashley Neel explained this budget amendment was to purchase American flag decals for fire trucks.

A motion was made by Commissioner Gillham, seconded by Commissioner Bolt, to a budget amendment for Fund 706 Gifts and Contributions. Motion carried 5-0.

AYE: Gillham, Bolt, Finley, Rutherford, Salter

NAY: None

AGENDA ITEM NO. 5:

Consideration of an ordinance amending Chapter 5 “Animals”, Section 5-7 “Keeping Fowl” of the City of Shawnee Code regulating the keeping of fowl and chickens for personal use within City Limits; and also providing for severability, codification, and repealer.

Planning Director Rebecca Blaine provided a staff report. She advised that the Pottawatomie County Policy Council has assisted with the preparation of the ordinance. She stated that several communities in Oklahoma have adopted similar ordinances permitting urban chickens. She also advised that a maximum of six (6) egg laying hens would be allowed, but no roosters. Ms. Blaine stated that a landlord or Homeowners Association would supersede the ordinance.

A motion was made by Commissioner Bolt, seconded by Commissioner Gillham, to approve an ordinance amending Chapter 5 “Animals”, Section 5-7 “Keeping Fowl” of the City of Shawnee Code regulating the keeping of fowl and chickens for personal use within City Limits; and also providing for severability, codification, and repealer.

Ordinance No. 2674NS was introduced.

AN ORDINANCE OF THE CITY OF SHAWNEE, OKLAHOMA AMENDING CHAPTER 5 – “ANIMALS”, SECTION 5-7 “KEEPING FOWL”, OF THE CITY CODE REGULATING THE KEEPING OF FOWL AND CHICKENS FOR PERSONAL USE WITHIN CITY LIMITS; AND ALSO PROVIDING FOR SEVERABILITY, CODIFICATION, AND REPEALER.

Motion carried 5-0.

AYE: Bolt, Gillham, Finley, Rutherford, Salter

NAY: None

Ordinance No. 2674NS was adopted by the City Commission.

AGENDA ITEM NO. 6:

Consideration of an ordinance amending Chapter 8, Article VIII of the City of Shawnee Code, so as to further comport with State Law 63 O.S. 420A et seq. and OAC 310;618-1-1 et seq.; providing for severability; and declaring an emergency.

City Attorney Joe Vorndran explained this is a housekeeping item to clean up discrepancies and comport with the State of Oklahoma.

A motion was made by Commissioner Bolt, seconded by Commissioner Gillham, to approve an ordinance amending Chapter 8, Article VIII of the City of Shawnee Code, so as to further comport with State Law 63 O.S. 420A et seq. and OAC 310;618-1-1 et seq.; providing for severability.

Ordinance No. 2675NS was introduced.

AN ORDINANCE AMENDING CHAPTER 8 (BUSINESSES, PERMITS AND LICENSES), ARTICLE VIII. – (MEDICAL MARIJUANA) OF THE CODE OF THE CITY OF SHAWNEE, SO AS TO FURTHER COMPORT WITH STATE LAW 63 O.S. 420A ET SEQ. AND OAC 310: 618-1-1 ET SEQ.; PROVIDING FOR SEVERABILITY; AND DECLARING AN EMERGENCY.

Motion carried 5-0.

AYE: Bolt, Gillham, Finley, Rutherford, Salter

NAY: None

Ordinance No. 2675NS was adopted by the City Commission.

A motion was made by Commissioner Gillham, seconded by Commissioner Bolt, to approve emergency clause relating to Ordinance No. 2675NS. Motion carried 5-0.

AYE: Gillham, Bolt, Finley, Rutherford, Salter

NAY: None

AGENDA ITEM NO. 7:

New Business (Any matter not known or which could not have been reasonably foreseen prior to the posting of the agenda.)

There was no New Business.

AGENDA ITEM NO. 8:

Commissioners Comments

Commissioner Bolt thanked Commissioner Rutherford for his work with the Cops and Kids event.

Commissioner Gillham recognized Derek Woody, a City of Shawnee employee, for helping a child with his bicycle.

Commissioner Rutherford said the Cops and Kids event was great. Commissioner Bolt took photographs and flew a drone over the area. He thanked the Police Chief and staff for their participation.

AGENDA ITEM NO. 9:

Adjournment

There being no further business to be considered, the meeting was adjourned by power of the Chair. (6:17 p.m.)

ATTEST:

RICHARD FINLEY, MAYOR

LISA LASYONE, CMC, CITY CLERK

Regular Board of Commissioners**2. b.**

Meeting Date: 09/16/2019

Reports and Minutes

Submitted By: Kacie Eck, City Clerk

Department: City Clerk

Information

Title of Item for Agenda

Acknowledge the following reports and minutes:

- License Payment Report for August 2019
- Project Payment Report for August 2019
- Planning Commission Minutes from the August 7, 2019 regular meeting
- Wes Watkins Reservoir Oversight Committee from the June 6, 2019 regular meeting

Attachments

License Pymt Rpt

Project Pymt Rpt

Planning Minutes

Wes Watkins Minutes

9/10/2019 2:15 PM
LICENSES: THRU ZZZZZZZZZZ

L I C E N S E P A Y M E N T R E P O R T
SORTED BY: CODE

PAGE: 1
PAYMENT DATES: 8/01/2019 TO 8/31/2019

** FEE CODE TOTALS **

FEE CODE	DESCRIPTION		FEE	PENALTY	PAYMENT DISTRIBUTION TAX	INTEREST	TOTAL PAID
ACATER	ALCOHOL CATERER LICENSE FEE	1	1,005.00CR				1,005.00
ALARM	BURGLAR/FIRE ALARM LICENSE	6	150.00CR				150.00
ALARMRENEW	BURGLAR/FIRE ALARM RENEW	2	30.00CR				30.00
BEERWINER	BEER AND WINE RENEWAL	11	5,000.00CR				5,000.00
ELEC1	ELECTRICAL CONTRACTOR INITIAL	2	200.00CR				200.00
ELEC2	ELECTRICAL CONTRACTOR RENEW	4	300.00CR	25.00CR			325.00
IMERC	ITINERANT MERCHANT FEE	1	3.00CR				3.00
LAKELEASE	LAKE LEASE	9	6,453.00CR				6,453.00
LAKEXFER	LAKE LEASE TRANSFER FEE	2	2,000.00CR				2,000.00
LIQR	RETAIL LIQUOR OCCUPATIONAL TAX	2	1,505.00CR				1,505.00
MARIJFEE1	MARIJUANA BASE FEE	1	100.00CR				100.00
MECH1	MECHANICAL CONTRACTOR INITIAL	4	400.00CR				400.00
MECH2	MECHANICAL CONTRACTOR RENEW	5	400.00CR				400.00
PLUM1	PLUMBING CONTRACTOR INITIAL	1	100.00CR				100.00
PLUM2	PLUMBING CONTRACTOR RENEW	5	375.00CR	75.00CR			450.00
SIGN	SIGN HANGERS LICENSE FEE	1	75.00CR				75.00
TOTAL			18,096.00CR	100.00CR			18,196.00

09/10/2019 10:58 AM

PROJECT PAYMENT REPORT

PAGE

STATUS: ALL
SEGMENT CODES: All
FEE CODES: All

PROJECTS: THRU ZZZZZZZZZZ
PAYMENT DATES: 8/01/2019 TO 8/31/2019
SORTED BY: PRG

** GENERAL LEDGER DISTRIBUTION **

FUND G/L ACCOUNT	ACCOUNT NAME	AMOUNT
001-2133	UBCC FEE PAYABLE	280.00CR
001-4202	BUILDING PERMITS	12,555.43CR
001-4203	PLUMBING PERMITS	3,275.00CR
001-4204	ELECTRICAL PERMITS	1,050.00CR
001-4205	ZONING PERMITS & APPLICATIONS	280.00CR
001-4206	HEATING & A/C PERMITS	1,312.50CR
001-4249	OTHER PERMITS	620.00CR
001-4822	OTHER MISC. REVENUE	35.00CR
101-4249	OTHER PERMITS	200.00CR
501-4510	WATER TAPS	2,100.00CR
799-1023	BANCFIRST GENERAL ACCT	21,707.93

09/10/2019 10:58 AM
STATUS: ALL
SEGMENT CODES: All
FEE CODES: All

P R O J E C T P A Y M E N T R E P O R T

PAGE:
PROJECTS: THRU ZZZZZZZZZZ
PAYMENT DATES: 8/01/2019 TO 8/31/
SORTED BY: PRO

** SEGMENT CODE TOTALS **

SEGMENT CODE	DESCRIPTION	TOTAL PAID
B1-NEW	BUILDING CONSTRUCTION NEW	9,041.30CR
B2-ADD	BUILDING CONSTRUCTION ADD	2,687.13CR
B3-REMODEL	BUILDING CONSTRUCTION REM	4,871.50CR
B4-CARPORT	BUILDING CARPORT	29.50CR
B4-STORAGE	BUILDING STORAGE SHED	361.50CR
E3-REMODEL	ELECTRICAL REMODEL/REPAIR	1,113.00CR
M3-REMODEL	MECHANICAL REMODEL/REPAIR	1,309.50CR
P3-REMODEL	PLUMBING REMODEL	1,035.50CR
P5-SEPTIC	SEPTIC PERMIT	75.00CR
X-BORE/CUT	BORING & PAVING CUT PERMI	50.00CR
X-CURBCUT	CURBCUT/DRIVEWAY/SIDEWALK	150.00CR
X-DEMO	DEMOLITION PERMIT	100.00CR
X-PLATFIN	PLAT REVIEW FINAL	75.00CR
X-SIGN	SIGN PERMIT	200.00CR
X-SWIMPOOL	SWIMMING POOL PERMIT	129.00CR
Z-OCCUP	OCCUPANCY PERMIT	200.00CR
Z-REZONING	REZONING REQUEST	280.00CR
TOTAL		21,707.93CR

PLANNING COMMISSION MINUTES

DATE: AUGUST 7TH, 2019

The Planning Commission of the City of Shawnee, County of Pottawatomie, State of Oklahoma, met in the Commission Chambers, at City Hall, 9th and Broadway, on Wednesday, August 7th, 2019, at 1:30 p.m., pursuant to notice duly posted as prescribed by law.

AGENDA ITEM NO.1:

Roll Call

Upon roll call the following members were present:

Present: Matthews, Walker, Bergsten, Rowell, Kienzle, Melot

Absent: Deem

Meeting was called to Order.

AGENDA ITEM NO.2:

Consideration of approval of the minutes from the regular meeting of the Planning Commission on July 3rd, 2019

Chairman Bergsten asked Commissioners for any comments, questions, or a vote. Commissioner Matthews motioned to approve the minutes; seconded by Commissioner Kienzle.

Motion passed:

AYE: Matthews, Rowell, Kienzle

NAY:

ABSTAIN: Walker, Bergsten

OBSERVING: Melot

AGENDA ITEM NO.3:

Citizens' Participation

Chairman Bergsten opened the public portion of the meeting and announced that this is an open time for discussion for those with questions on topics not on the Agenda and asked if anyone would like to come forward.

No one came forward and Chairman Bergsten closed the public portion of the meeting.

AGENDA ITEM NO.4:

Case #P11-19 – Public hearing and consideration of approval of a rezone request from A-1 (Rural Agricultural) to R-1 (Single-Family Residential), located at 1510 North Elm Avenue, Shawnee, Oklahoma, for the purpose of a single-family home

Applicant: Dale Wiginton

Planning Director Rebecca Blaine presented staff report. She stated the lot is being rezoned to a district for its current use, a single-family home. She stated the Planning Department has a policy of correcting incorrectly zoned lots such as this one, and that they waived the application fee for Mr. Wiginton. She stated staff recommends approval.

Chairman Bergsten opened the public portion of the meeting and asked if anyone speaking against the item would like to come forward.

No one came forward and Chairman Bergsten asked if anyone speaking in favor of the item would like to come forward. No one came forward and Chairman Bergsten closed the public portion of the meeting.

Chairman Bergsten asked if there were any other comments or questions. There were no comments or questions and Chairman Bergsten asked for a motion. Commissioner Kienzle motioned to approve of the rezone; seconded by Commissioner Matthews.

Motion passed:

AYE: Matthews, Walker, Bergsten, Rowell, Kienzle

NAY:

ABSTAIN:

OBSERVING: Melot

AGENDA ITEM NO.5:

Case #P12-19 – Public hearing and consideration of approval of a rezone request from R-1 (Single-Family Residential) to C-3 (Highway Commercial), located at 3914 North Kickapoo Avenue, Shawnee, Oklahoma, for the purpose of a shopping strip center

Applicant: Margaret Davis

Planning Director Rebecca Blaine presented staff report. She stated many rezones are happening in this area due to Kickapoo Avenue being one of the primary commercial arterial streets in Shawnee, and that the Planning Department encourages commercial development in areas like this. She stated staff recommends approval.

Chairman Bergsten opened the public portion of the meeting and asked if anyone speaking against the item would like to come forward.

No one came forward and Chairman Bergsten asked if anyone speaking in favor of the item would like to come forward. No one came forward and Chairman Bergsten closed the public portion of the meeting.

Chairman Bergsten asked if there were any comments or questions. There were no comments or questions and Chairman Bergsten asked for a motion. Commissioner Kienzle motioned to approve of the rezone; seconded by Commissioner Rowell.

Motion passed:

AYE: Matthews, Walker, Bergsten, Rowell, Kienzle

NAY:

ABSTAIN:

OBSERVING: Melot

AGENDA ITEM NO.6:

Case #P13-19 – Public hearing and consideration of approval of a rezone request from C-1 (Neighborhood Commercial) to C-3 (Highway Commercial), located at 1601 North Kickapoo Avenue, Shawnee, Oklahoma, for the purpose of making leasing vacant spaces easier

Applicant: John Brown

Planning Director Rebecca Blaine presented staff report. She stated the applicant property is adjacent to two C-3 zoned properties, and that the applicant desires to broaden the amount of uses tenants can do in the building. She stated staff recommends approval.

Chairman Bergsten opened the public portion of the meeting and asked if anyone speaking against the item would like to come forward.

No one came forward and Chairman Bergsten asked if anyone speaking in favor of the item would like to come forward. The applicant, John Brown, came forward. He stated he is representing his parents. He stated he is here to answer any questions the Commission may have, and thanks the Commission for their service. No one else came forward and Chairman Bergsten closed the public portion of the meeting.

Chairman Bergsten asked if there were any comments or questions. There were no comments or questions and Chairman Bergsten asked for a motion. Commissioner Walker made a motion to approve of the rezone; seconded by Commissioner Kienzle.

Motion passed:

AYE: Matthews, Walker, Bergsten, Rowell, Kienzle

NAY:

ABSTAIN:

OBSERVING: Melot

AGENDA ITEM NO.7:

Case #P14-19 – Public hearing and consideration of approval of a rezone request from RE (Residential Estate) to C-3 (Highway Commercial), located at 39405 West MacArthur Street, Shawnee, Oklahoma, for the purpose of a medical marijuana dispensary

Planning Director Rebecca Blaine presented staff report. She stated that, in the mile stretch of this block, there are eight different zoning classifications from four different districts. She stated the 2005 Comprehensive Plan designates the future land use of this area as residential; however, there have been several rezones to C-3 in this area since the 2005 Comprehensive Plan was adopted, all of which took place in areas it designated as residential. She noted that the City has been working on a new Comprehensive Plan, which will be on the Agenda for the Planning Commission next month, and the City will have a new Comprehensive Plan adopted. She stated the new Comprehensive Plan has the subject property designated as residential; furthermore, the housing study completed by the consulting firm RDG stated the City is low on housing inventory stock. She stated staff recommends approval of this rezone due to the current precedent that has been set for this area.

Chairman Bergsten asked Director Blaine to clarify the date that the Planning Commission will be reviewing the Comprehensive Plan. She stated it would be on September 4th, 2019. Chairman Bergsten stated to the Commission that they have the option to defer the item in order to base the decision of the Commission on either the 2005 Comprehensive Plan or the 2019 Comprehensive Plan to be adopted.

Chairman Bergsten stated to the audience that the Commission may defer the item in order to make a decision on the subject property based upon the soon to be newly adopted Comprehensive Plan, and a motion to defer the item to a later date could be made right now. Commissioner Matthews stated his interest in doing so. He stated the City has put a lot of effort into developing the 2019 Comprehensive Plan. Commissioner Matthews clarified that if the Commission chooses to defer the item right now, they would wait to hold the public portion of the meeting until the next time the item is heard by the Commission. Chairman Bergsten asked for a motion. Commissioner Matthews made a motion to defer the item to the October 2nd, 2019 Planning Commission Meeting; seconded by Commissioner Rowell.

Motion passed:

AYE: Matthews, Walker, Bergsten, Rowell, Kienzle

NAY:

ABSTAIN:

OBSERVING: Melot

AGENDA ITEM NO.8:

Consideration and discussion of an Urban Chicken Ordinance, for the purpose of regulating the keeping and raising of fowl.

Planning Director Rebecca Blaine presented the ordinance. She explained what the origins for the conceptualization of this ordinance was. She stated that the cities of Norman and Edmond have recently adopted new urban chicken ordinances. She briefly summarized the contents of the Ordinance.

Commissioner Walker asked Director Blaine how the enforcement of this Ordinance would be implemented. She stated it would be complaint driven. She stated the other communities with urban chicken ordinances that she has discussed this issue with have stated they have had little issues with their citizenry when it came to this type of regulation. Commissioner Walker stated the ordinance does not state what happens if the City determines a chicken is a nuisance animal. Director Blaine stated their permit for having chickens would be revoked with Director's discretion. She stated additional language could be added to more specifically address this process.

Commissioner Matthews asked if this Ordinance is consistent with Norman and Edmond. Director Blaine stated Edmond's ordinance is unique. She stated their minimum lot size for chickens is 0.68 acres. She stated her ordinance is most in line with Norman, and that she preferred Norman's ordinance.

Chairman Bergsten clarified that enforcement would be complaint driven and that there is no other avenue of enforcement. Director Blaine stated that is correct.

Chairman Bergsten asked if there were any comments or questions. There were no comments or questions and Chairman Bergsten asked for a motion. Commissioner Matthews made a motion to approve of the Urban Chicken Ordinance; seconded by Commissioner Walker.

Motion passed:

AYE: Matthews, Walker, Bergsten, Rowell, Kienzle

NAY:

ABSTAIN:

OBSERVING: Melot

AGENDA ITEM NO.9:

Planning Director's Report

Planning Director Rebecca Blaine stated the final draft of the 2019 Comprehensive Plan that RDG has created for the City.

She stated there was an inquiry about the fencing at the Shawnee Milling Company. She stated they are fixing their fencing, and cleaning up the area.

She stated the APA Quad-State conference is coming up at the end of September in Tulsa, Oklahoma. She told the Commission that they are welcome to come. Commissioner Kienzle stated she is presenting at this conference.

AGENDA ITEM NO. 10:

Commissioners Comments and/or New Business

Commissioner Kienzle expressed her excitement about the sidewalks being created on Harrison Avenue.

Commissioner Walker noted that a vehicle dealer had their wares parked on the sidewalk.

Chairman Bergsten asked what else would be coming to Domino Plaza. Director Blaine stated a clinic is going there. Commissioner Kienzle asked if the clinic was for humans or pets. Director Blaine stated it is for humans. Chairman Bergsten the dog park looks nice.

Commissioner Kienzle asked what the City's regulations on drop-off bins for donating clothing and shoes are. Director Blaine stated she would look into that issue. Commissioner Kienzle stated it is an eye sore. Commissioner Walker stated it looks like an outside storage facility.

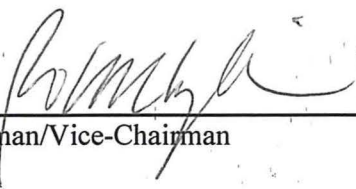
Chairman Bergsten asked if there have been any updates on Phase II of the Shawnee Market Place. Director Blaine stated she has no updates on that project.

Chairman Bergsten congratulated Rachael Melot on her appointment to the Planning Commission and expressed his appreciation for her joining the Commission.

AGENDA ITEM NO.11:

Adjournment

Meeting was adjourned.



Chairman/Vice-Chairman

Joseph Barker
Planning Commission Secretary



Office of the Director of Operations

Minutes
WES WATKINS RESEVIOR OVERSIGHT COMMITTEE
JUNE 6, 2019
The Committee met at McLoud City Hall
The meeting was called to order at 9:00 am

Roll Call was taken showing the following members present:

		Present	Absent
Member	Jimmy Stokes (Tecumseh)	<u> X </u>	<u> </u>
Member	Buck Day (McLoud)	<u> X </u>	<u> </u>
Member	Steve Shultz (PCDA)	<u> X </u>	<u> </u>
Member	James Bryce (Shawnee)	<u> X </u>	<u> </u>
City Staff	Whisper Peace (Shawnee)	<u> X </u>	<u> </u>
City Staff	Cody Roe (McLoud)	<u> X </u>	<u> </u>
Guest		<u> X </u>	<u> </u>

1. **Call to Order.**
2. **Roll Call and Declaration of a Quorum.** Roll was called and a quorum was declared.
3. **Approved minutes for March 7, 2019.** Buck Day made a motion to approve. Motion was 2nd by Steve Schultz.

4. REPORTS AND DISCUSSION:

a. Lake Budget report

- The lake fund budget for the year ended June 30, 2020 was handed out by Cody Rowe. The group agreed the “other income” (\$50,000) line needs to be removed as it should not be shown as income but as a reimbursement amount from Shawnee and Tecumseh.
- James Bryce recommended there be a separate “capital” budget made for next year for repairs and also a list to show repairs that have already been made.

b. Lake Activities and Repairs

- Cody Rowe gave an update on gave an update on the Lake activities for Memorial Weekend. He advised the Lake had many campers but did not fill to capacity, and the lift stations were down but Shawnee is working to get them fixed. They used port-a- potties instead.
- Restrooms need still need some electric repairs and one urinal needs to be replaced.
- Buoys need to be inspected and some may need to be replaced.
- Mowers and boat are all in good condition at this time.
- Steve Schultz gave an update on the Dam inspection. The inspection went well and the repairs will begin around the first of next year. NRCS will fund the repairs and OCC will be working on a sink hole behind the dam.

c. Discussion and possible action on future meeting dates.

- There was no discussion on meeting dates.

5. QUESTIONS OR COMMENTS: None.

6. ADJOURNMENT: Meeting adjourned at 9:35 am.

Date 9-5-19
Chairman [Signature]

Regular Board of Commissioners

2. c.

Meeting Date: 09/16/2019

Sub-Grant

Submitted By: Kacie Eck, City Clerk

Department: City Clerk

Information

Title of Item for Agenda

Authorize staff to apply for sub-grant of Emergency Management Performance Grant funding from the Oklahoma Department of Emergency Management.

Attachments

Memo



MEMORANDUM FOR: Honorable Mayor and City Commissioners
THROUGH: Chance Allison, City Manager *D.L.*
FROM: Donald D. Lynch, Emergency Management Director
DATE: September 11, 2019
SUBJECT: Request to Apply for EMPG Sub-Grant
MESSAGE:

NATURE OF THE REQUEST:

I am requesting permission for staff to apply for a sub-grant of Emergency Management Performance Grant funds from the Oklahoma Department of Emergency Management

STAFF ANALYSIS /CONSIDERATIONS:

This is the annual sub-grant program that the City has participated in for many years which helps defray the costs associated with the administration of our emergency management program. This request is for submission of an application for funding in the Federal Fiscal Year 2020 cycle.

The grant guidance is attached for your review.

RECOMMENDATION:

Staff recommends approval.

BUDGET CONSIDERATION:

History shows that we have been awarded \$50,000 for the past 2 years. We anticipate a level funding award for this grant cycle.

Thank you for your favorable attention to this request.

MARK GOWER
State Director



J. KEVIN STITT
Governor

STATE OF OKLAHOMA
DEPARTMENT OF EMERGENCY MANAGEMENT

August 30, 2019

Dear Director:

The City of Shawnee is invited to submit a sub-grant funding application for the Emergency Management Performance Grant (EMPG) program, Fiscal Year 2020 (October 1, 2019 to September 30, 2020) for an amount to be determined as funds become available. EMPG is a **performance based** sub-grant. Contingent upon successful completion of the identified requirements in the application, Subrecipients will receive up to twenty-five percent (25%) of the awarded sub-grant to be paid in quarterly disbursements.

Please review the eligibility and performance requirements in the FY 2020 EMPG sub-grant agreement carefully before applying. Applicants are encouraged to review the FEMA Preparedness Grants Manual Appendix H <https://www.fema.gov/media-library/assets/documents/178291> for additional information. **Applicants must submit all of the required documentation in order to receive EMPG sub-grant approval.** The omission of any document may result in a rejected application without further inquiry. It is the Oklahoma Department of Emergency Management's (OEM) intent to supplement (**NOT** supplant) city, county and tribal Emergency Management program funds. This can only be achieved by the commitment and compliance of EMPG Subrecipients.

The application must be received no later than September 30, 2019 to be eligible. **Grant funds may not be awarded to** The City of Shawnee **if the application is not submitted by** September 30, 2019. If you have any questions, please contact your OEM Regional Coordinator and/or email EMPG@oem.ok.gov.

Emergency Management Grant Program

FY2020 Sub-Grant Agreement

This agreement is entered into by and between **The State of Oklahoma Department of Emergency Management (OEM)**, and The City of Shawnee, Oklahoma, hereinafter referred to as the “Subrecipient”. OEM and the Subrecipient agree to the following terms and conditions:

Article 1. Eligibility Criteria

To be eligible for an Emergency Management Performance Grant (EMPG) Sub-grant, a local Subrecipient must meet the following eligibility requirements:

1. The Subrecipient must have a current existing Emergency Management program.
Refer to Article 2. Minimum Task/Activity Requirements.
2. The Subrecipient must have a paid Emergency Management Director, either full or part time, who works at least 20 hours a week and is employed as defined under Oklahoma State Statute, Title 63-683.11 to 13, Emergency Management Compact and the Fair Labor Standards Act (See Title 63 excerpt attachment provided in application packet).
3. The Emergency Management Program budget must exceed the Emergency Management Performance Grant dollar amount and cover the entire cost of the Subrecipient’s emergency management office, independent of any sub-grant monies. The Emergency Management Performance Grant is based on a 50/50 match (50% local and 50% federal).
A certified copy of the Emergency Management Budget for the Subrecipient must be included with the application. For the Emergency Management Performance Grant closeout, during the 4th quarter only, provide a notarized copy of the local Subrecipient’s year end emergency manager’s treasurer’s / county clerk’s report. **Please note:** The Subrecipient cannot replace the Emergency Management program’s budget with EMPG

funds. The EMPG funds are supplemental funds for improving and/or increasing the Subrecipient's Emergency Management Program only and **cannot** be used to supplant existing funds.

4. Grant funds and/or grant matching funds may not be used for costs to support hiring sworn public safety officers for the purposes of fulfilling traditional public safety duties or to supplant traditional public safety positions and responsibilities.
5. Should have a facility or location designated as the Subrecipient's Emergency Operations Center (EOC) with the capacity to coordinate response efforts and resource capabilities in the event of an incident.
6. A list of your Subrecipient All Hazard, Whole Community Planning Group Annexes or Emergency Support Function (ESF) representatives, Tribal representatives, Higher-Education representatives, business partners as well as any other persons the Planning Group deems necessary to promote the "whole community" concept of planning. The Planning Group list will include name, position, email and phone number.
7. ***Maintain a 24-hour point of contact who will promptly report to the OEM Duty Officer, (800) 800-2481, all significant events happening within the jurisdiction.*** (Per State Statute, Title 63–683.11.E)
8. Maintain an Current Emergency Operations Plan (EOP) to be updated/reviewed annually (Per State Statute, Title 63–683.11.D)
9. Hazard Mitigation Plan (HMP) meeting one of the following criteria:
 - a. FEMA approved plan that is still active.

OR

 - b. A detailed plan and timeline describing how the Subrecipient will produce a FEMA approved plan.
10. National Incident Management System (NIMS) Compliance Certificate

Article 2. Minimum Task/Activity Requirements

The following 8 activities are the minimum task requirements that shall be completed by the Subrecipient. All deliverables will be submitted to the OEM EMPG Grants Manager.

Preparedness and Planning

1. Quarterly ALL Hazard, Whole Community Planning Group Meetings

An All-Hazard, Whole Community Planning group within your jurisdiction will be formed consisting of all Annexes or Emergency Support Function (ESF) representatives, Tribal representatives, Higher Education representatives and business partners as well as any other persons the Planning Group deems necessary to promote the “whole community” concept of planning to meet quarterly.

Measurement Methods:

- a. A meeting invitation letter for each meeting to include a mailing list (can be an email copy).
- b. An agenda
- c. Minutes for each quarterly meeting should reflect EOP and Hazard Mitigation planning and/or Hazard Mitigation projects.
- d. Sign-in sheets for each quarterly meeting (dated).

2. Preparedness Projects

Emergency Management Whole Community Preparedness projects.

Measurement Methods:

- a. Submit a summary of your anticipated Emergency Management whole community preparedness activities for the current grant year. Must be submitted with your application.

- b. On a quarterly basis, submit progress reports for preparedness activities within your jurisdiction. Examples of appropriate preparedness projects include, but are not limited to, outreach at the Subrecipient's events, social media presence, and other activities.

3. Emergency Operations Plan

The Subrecipient must have an Emergency Operations Plan (EOP) to participate in the EMPG program. The All Hazard, Whole Community Planning Group will be directly involved in the quarterly planning and updates of the Subrecipient's EOP. The EOP will be updated according to CPG 101-v.2.

Measurement Methods:

- a. The All-Hazard, Whole Community Planning quarterly report submitted to OEM.
- b. Sign-in Sheet from Quarterly Planning Meetings.
- c. An EOP approval page signed annually by each of the Annexes or ESF representatives and the Subrecipient's highest elected official(s) by the 4th quarter report and no later than October 10, 2020 (form provided).

4. Hazard Mitigation Plan Status Update

The Subrecipient must have a FEMA approved Hazard Mitigation Plan or a detailed plan and timeline describing how the Subrecipient will produce a FEMA approved plan. The All Hazard, Whole Community Planning Group will update the Subrecipient's Hazard Mitigation plan as required.

Exercise

5. Two (2) Exercises of Any Type

The Subrecipient must conduct two (2) exercises of any type annually.

The types of exercises are Seminars, Workshops, Tabletop, Games, Drills, Functional, and Full-Scale. All exercises need to test all or part of the Emergency Operations Plan.

The exercises must comply with the Homeland Security Exercise and Evaluation Program (HSEEP) requirements.

Measurement Methods:

A copy of the After-Action Report-Improvement Plan (AAR-IP) for each exercise must be submitted to OEM by the 4th quarter report and no later than October 10, 2020.

6. One (1) Full Scale Exercise

The Subrecipient must complete one Full-Scale Exercise annually. All exercises need to test all or part of the Emergency Operations Plan. The exercises must comply with the Homeland Security Exercise and Evaluation Program (HSEEP) requirements.

Measurement Methods:

The AAR-IP for the Subrecipient's part of the exercise must be generated by the Subrecipient and a copy of the AAR-IP and sign in sheet must be submitted to OEM by the 4th quarter report and no later than October 10, 2020.

Training

7. Attendance of the Strategic Regional Planning Workshop

The OEM Regional Coordinator, in conjunction with local Emergency Managers, will host a Regional Planning Workshop. The Emergency Management Director or designee must attend their Region's Workshop in its entirety.

Measurement Methods:

A copy of the certificate or other appropriate documentation (such as sign-in sheets) shall be submitted to OEM by the 4th quarter report and no later than October 10, 2020.

8. Attendance of the Annual Oklahoma Emergency Management Conference

The Emergency Management Director or designee must attend the Annual Oklahoma Emergency Management Conference.

Measurement Methods:

A copy of the certificate or other appropriate documentation (such as sign-in sheets) shall be submitted to OEM by the 4th quarter report and no later than October 10, 2020.

9. EMPG Required Online Independent Study (IS) Courses.

All of the Subrecipient's paid emergency management staff are required to complete 11 FEMA IS Courses by September 30th, 2020. These include IS-100, IS-200, IS-700, IS-800, IS-120.a, IS-230.d, IS-235.b, IS-240.b, IS-241.b, IS-242.b, and IS-244.b.

Measurement Methods:

The submission of either FEMA transcript(s) and/or FEMA Course certificates proving the completion of course work until all 11 courses are completed for all paid emergency management staff.

Article 3. Authorized Representatives

The Agency Director of the Oklahoma Department of Emergency Management and the Subrecipient's Director of Emergency Management shall be the authorized representatives to complete work and negotiate changes to this agreement. On a form provided by OEM, the Subrecipient will identify a Director of Emergency Management, an alternate point-of-contact (such as a deputy director), and the Subrecipient's official mailing address. The Director of Emergency Management for the Subrecipient will serve as the official point-of-contact (POC), responsible for reporting on, or responding to inquiries regarding the six (6) phases of emergency management (mitigation, preparedness, response, recovery, prevention, and protection) to include incident reporting.

Article 4. Duration and Closeout

This agreement shall be in full force and effective on October 1, 2019 for both parties and terminate on September 30, 2020, unless terminated by either party prior to that time in writing. OEM may at its discretion extend the term of the Closeout of this agreement. If approved, extensions are typically approved for no more than a 30-day period.

Article 5. Purpose

The purpose of this agreement is to provide a 50/50 sub-grant with a portion of the funds awarded to the State of Oklahoma under the Federal Emergency Management Agency (FEMA)'s Emergency Management Performance Grant (EMPG) program. The EMPG program encourages the development of a comprehensive emergency preparedness system for all hazards by the State and local governments.

Article 6. Authorities

The authorities for this award are:

The Robert T. Stafford Disaster Relief and Emergency Assistance Act, as amended, 42 U.S.C. § 5121 et. Seq. (the Stafford Act); Title 2, Code of Federal Regulations (CFR), U.S. Department of Homeland Security Presidential Directive 5 (HSPD-5); Oklahoma Emergency Management Act 2003, 63 O.S. 683. 1 et. Seq.; State Administrative Plan adopted by the Oklahoma Department of Emergency Management.

Article 7. Time of Completion

The Subrecipient shall complete all work during Federal Fiscal Year 2020, with the exception that the auditor's opinion letter, which accompanies the Subrecipient's annual audit, must be submitted within nine months of the Subrecipient's fiscal year.

Article 8. Suspension of Sub-Grant/Debarment from Future Awards

If the Subrecipient fails to complete the agreed scope of work they may be barred from participation in the sub-grant program for the following Federal Fiscal Year.

Article 9. General Provisions

- A. All work shall be completed in a professional manner and in compliance with all applicable laws.
- B. To the extent required by law, individuals duly licensed and authorized by law to do so shall perform all work.

- C. The Subrecipient warrants that it is adequately insured for injury to its employees and others incurring loss or injury as a result of the acts of the Subrecipients or its employees or agents.
- D. The Subrecipient agrees that neither it nor its employees or agents are covered under insurance paid for by the State of Oklahoma and are not authorized to obligate the State of Oklahoma, its employees or agents.
- E. The Standard Assurances for Federal Funds submitted by the Subrecipient, as part of their application package, are hereby referenced and incorporated into this agreement.

Regular Board of Commissioners

2. d.

Meeting Date: 09/16/2019

Donation

Submitted By: Kacie Eck, City Clerk

Department: City Clerk

Information

Title of Item for Agenda

Acceptance of donation of materials in the approximate amount of \$1,500.00 for the repair of a pavilion at Lions Club Park by Mrs. Linda White.

Attachments

No file(s) attached.

Regular Board of Commissioners

2. e.

Meeting Date: 09/16/2019

Donation

Submitted By: Kacie Eck, City Clerk

Department: City Clerk

Information

Title of Item for Agenda

Acceptance of donation of a metal roof in the approximate amount of \$1,500.00 for the repair of a pavilion at Lions Club Park by Indaco Metals.

Attachments

No file(s) attached.

Regular Board of Commissioners

2. f.

Meeting Date: 09/16/2019

Resignation

Submitted By: Kacie Eck, City Clerk

Department: City Clerk

Information

Title of Item for Agenda

Acknowledge the resignation of Marissa Lightsey from the Shawnee Library Board.

Attachments

Resignation

Kacie Eck

From: Kacie Eck
Sent: Thursday, September 12, 2019 3:08 PM
To: Kacie Eck
Subject: FW: Resignation: Lightsey/Library Board

From: Marissa Lightsey
Sent: Wednesday, September 4, 2019 12:20 PM
To: Peggy Cook

Subject: Re: About the Shawnee City library board

Thank you for including me, I hereby retire from service.

[Sent from Yahoo Mail on Android](#)

Regular Board of Commissioners

2. g.

Meeting Date: 09/16/2019

Mayor's Appointments

Submitted By: Kacie Eck, City Clerk

Department: City Clerk

Information

Title of Item for Agenda

Mayor's Appointments:

Shawnee Hospital Authority

Rt. Rev. Lawrence Stasyszen, O.S.B. Expires: September 30, 2025

Reappointment

Dr. Sudhir Gupta

Expires: September 30, 2025

Reappointment

Shawnee Library Board

Justin Wood 1st Full Term

Expires: June 30, 2022

Reappointment

Attachments

Stasyszen

Gupta

Wood



Office of the Abbot
St. Gregory's Abbey
1900 W. MacArthur ✕ Shawnee, OK 74804-2403
Phone: (405) 878-5491 ✕ FAX: (405) 878-5189
www.monksok.org

September 10, 2019

Mayor Richard Finley and Commissioners
City of Shawnee
C/O City Clerk City
P.O. Box 1448
Shawnee, OK 74802

Dear Mayor Finley and Commissioners,

Attached with this please find my application for reappointment to the Shawnee Hospital Authority.

It has been my pleasure to serve of the Shawnee Hospital Authority for several years. My engagement with the health and well being of our community began formally with my service on the board of Unity Hospital and has continued through my service on the board of the Avedis Foundation. It has been my honor and privilege to play an active role in advancing the resources and programs offered to our community and region through our local health care system and service organizations.

It is my hope to continue being an active part of these efforts through service on the Shawnee Hospital Authority and I am grateful for your consideration.

Sincerely,

Rt. Rev. Lawrence Stasyszen, O.S.B.



APPLICATION TO SERVE
Boards, Committees and Commissions

- ☐ Appointment
☒ Reappointment – Partial/First/Second Term

Name: Rt. Rev. Lawrence Stasyszen, O.S.B.	Application Date: September 10, 2019
Address: 1900 W. MacArthur	Date of Birth: June 7, 1064
Mailing Address: Shawnee, OK 74804-2403	
Daytime Phone: 405-519-5551	Fax: 405-878-5189
Email: abbot@monksok.org	
Profession: Benedictine Monk / Catholic Priest	
Business Name: St. Gregory's Abbey	
Business Address: 1900 W. MacArthur, Shawnee OK 74804	
Business Phone: 405-878-5490	Fax: 405-878-5189
Email: abbot@monksok.org	

Do you live within the City Limits of the City of Shawnee? ☒ Yes or No (please circle)

Do you currently serve on a City board, committee or commission? ☒ Yes or No (please circle)

If so, please list the board/committee: Shawnee Hospital Authority

How many years have you lived in Shawnee? 35

Select the Board/Committee/Commission you are interested in serving on: (please check)

☐ Airport Advisory Board	☐ Library Board
☐ Beautification Committee	☐ Oklahoma Baptist University Trust Authority
☐ Board of Adjustment (Zoning)	☐ Planning Commission
☐ Civic and Cultural Development Authority	☒ Shawnee Hospital Authority
☐ Community Service Contracts Review Committee	☐ Shawnee Urban Renewal Authority
☐ Housing Authority	☐ Traffic Commission
	☐ Other _____

Why are you interested in serving on the Board/Committee/Commission selected above?

I wish to continue my service on the Shawnee Hospital Authority due to my concern for public wellness and my experience on this authority.

Revised March 22, 2018

What will make you a good board member and what skills or knowledge do you have that would be relevant to this board/committee/commission?

I have been active with several not-for-profit boards in the community, including that of St. Gregory's University, the Mabee-Gerrer Museum of Art and Unity Hospital. My current involvement as a Board member for the Avedis Foundation engages me regularly in activities and initiatives to promote the health, wellness and quality of life of our community.

What civic or volunteer activities (if any) are you currently involved in?

I am active with the Mabee-Gerrer Museum of Art and with several ministries sponsored by St. Gregory's Abbey. I am a member of the Knights of Columbus, a faith based service organization.

List education, including degree(s) earned:

Bachelor of Arts (English), Licentiate in Sacred Theology, Doctorate in Sacred Theology

Have you ever served on a City-appointed board/committee/commission before? If so, which ones and for how long did you serve?

I am currently serving on the Shawnee Hospital Authority and have done so for over ten years.

Have you ever been charged and/or convicted of a felony? No.

If so, please explain the circumstances and the current status of the charge(s) and/or conviction(s):

Have you ever declared personal or business bankruptcy? No.

If so, please explain:

I note that I was on the board of St. Gregory's University when it declared bankruptcy in December 2017. This was a corporate organization and not my own private business.

Please include up to three personal or professional references:

Name	Relationship	Telephone Number
Charles Skillings, CEO SSM, St. Anthony Shawnee	Fellow Board Member, Avedis Foundation	405-878-8183
Kathy Laster, CEO of the Avedis Foundation	Colleague with the Avedis Foundation	405-273-4055
Larry Briggs, President, First National Bank	Various business/volunteer activities	405-275-8830

PLEASE READ CAREFULLY:

Appointment by the Commission is for one term and individuals may not serve more than two consecutive full terms. Appointment to a second term remains at the discretion of the City Commission.

My signature affirms that all information contained herein is true to the best of my knowledge, and that I understand that any misstatement of fact or misrepresentation of credentials may result in disqualification from further consideration.

Signature 

Date September 10, 2019

Revised March 22, 2018

Applications are retained on file for one (1) year. Applicants are encouraged to include a letter of interest with this application. Thank you for your interest in serving Shawnee.

Send completed application to:

Shawnee City Clerk
PO Box 1448
Shawnee OK 74802
Phone 405-878-1605
Fax 405-878-1581
CityClerk@shawneeok.org



APPLICATION TO SERVE
Boards, Committees and Commissions

☐ Appointment
☒ Reappointment - Partial/First/Second Term

Name: SUDHIR K GUPTA Application Date: 9.9.19
Address: 1117 INVERNESS CIRCLE Date of Birth: 02.20.1955
Mailing Address: SHAWNEE OK 74801
Daytime Phone: 4052735801 Fax: _____ Email: _____
Profession: Physician
Business Name: SMCC / St Anthony Shawnee Medical Group
Business Address: 3315 Kethley Road 74804
Business Phone: 4052735801 Fax: _____ Email: _____

Do you live within the City Limits of the City of Shawnee? Yes or No (please circle)

Do you currently serve on a City board, committee or commission? Yes or No (please circle)

If so, please list the board/committee: _____

How many years have you lived in Shawnee? 32

Select the Board/Committee/Commission you are interested in serving on: (please check)

☐ Airport Advisory Board	☐ Library Board
☐ Beautification Committee	☐ Oklahoma Baptist University Trust Authority
☐ Board of Adjustment (Zoning)	☐ Planning Commission
☐ Civic and Cultural Development Authority	☒ Shawnee Hospital Authority
☐ Community Service Contracts Review Committee	☐ Shawnee Urban Renewal Authority
☐ Housing Authority	☐ Traffic Commission
	☐ Other _____

Why are you interested in serving on the Board/Committee/Commission selected above?

Want to contribute into 'health care' in our community

What will make you a good board member and what skills or knowledge do you have that would be relevant to this board/committee/commission?

Involved in health care all my life

What civic or volunteer activities (if any) are you currently involved in?

Board Member Avedis Foundation.
Volunteer Health Clinic

List education, including degree(s) earned:

M.D., Fellow American College - Cardiology

Have you ever served on a City-appointed board/committee/commission before? If so, which ones and for how long did you serve?

same - before

Have you ever been charged and/or convicted of a felony? NO

If so, please explain the circumstances and the current status of the charge(s) and/or conviction(s):

Have you ever declared personal or business bankruptcy? NO

If so, please explain:

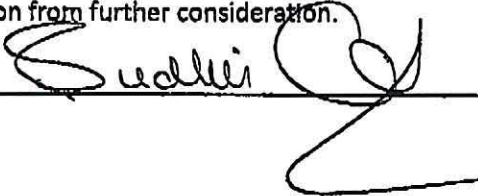
Please include up to three personal or professional references:

Name	Relationship	Telephone Number
DR John Robinson	Colleague	4052757400
Mr. Chuck Skilling	Hospital Affiliate	4052732270
Mr. Mike Warwick	Friend	2731554

PLEASE READ CAREFULLY:

Appointment by the Commission is for one term and individuals may not serve more than two consecutive full terms. Appointment to a second term remains at the discretion of the City Commission.

My signature affirms that all information contained herein is true to the best of my knowledge, and that I understand that any misstatement of fact or misrepresentation of credentials may result in disqualification from further consideration.

Signature 

Date 9.9.19

Applications are retained on file for one (1) year. Applicants are encouraged to include a letter of interest with this application. Thank you for your interest in serving Shawnee.

Send completed application to:

Shawnee City Clerk
PO Box 1448
Shawnee OK 74802
Phone 405-878-1605
Fax 405-878-1581
CityClerk@shawneeok.org



APPLICATION TO SERVE
Boards, Committees and Commissions

- ☐ Appointment
☒ Reappointment – Partial/First/Second Term

Name: <u>Justin Freedom Wood</u>	Application Date: <u>09/05/19</u>
Address: <u>1419 Sherry Ln 74801</u>	Date of Birth: <u>12/23/89</u>
Mailing Address: <u>Same</u>	
Daytime Phone: <u>405-840-0044</u> Fax: _____	Email: <u>Justinwood40k@gmail.com</u>
Profession: <u>Government</u>	
Business Name: <u>Sac And Fox Nation</u>	
Business Address: <u>920963 S Hwy 99 Stroud Ok 74079</u>	
Business Phone: <u>405 246 0044</u> Fax: _____	Email: _____

Do you live within the City Limits of the City of Shawnee? Yes or No (please circle)

Do you currently serve on a City board, committee or commission? Yes or No (please circle)

If so, please list the board/committee: Library

How many years have you lived in Shawnee? 29+

Select the Board/Committee/Commission you are interested in serving on: (please check)

☐ Airport Advisory Board ☐ Beautification Committee ☐ Board of Adjustment (Zoning) ☐ Civic and Cultural Development Authority ☐ Community Service Contract Review Committee ☐ Housing Authority ☒ Library Board	☐ Oklahoma Baptist University Trust Authority ☐ Parks and Recreation Committee ☐ Planning Commission ☐ Senior Citizens of Shawnee Board ☐ Shawnee Hospital Authority ☐ Shawnee Urban Renewal Authority ☐ Traffic Commission ☐ Other
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Why are you interested in serving on the Board/Committee/Commission selected above?

The Library is one of our most important assets in Shawnee.
We serve the most vulnerable & impressionable people. Reading is
vital to education & mental health.

What will make you a good board member and what skills or knowledge do you have that would be relevant to this board/committee/commission?

Knowledge of Shawnee & our people, government experience
+ relationships + I love books.

What civic or volunteer activities (if any) are you currently involved in?

Library board

List education, including degree(s) earned:

Seminole State College
University of Central Ok

Have you ever served on a City-appointed board/committee/commission before? If so, which ones and for how long did you serve?

Yes currently Library board, partial term

Have you ever been charged and/or convicted of a felony? No

If so, please explain the circumstances and the current status of the charge(s) and/or conviction(s):

Have you ever declared personal or business bankruptcy? No

If so, please explain:

Please include up to three personal or professional references:

Name	Relationship	Telephone Number
Shane Jett	Mentor, Colleague	405-432-7686
Louise Loulitz	Mentor, Friend	914-253-2856

PLEASE READ CAREFULLY:

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My signature affirms that all information contained herein is true to the best of my knowledge, and that I understand that any misstatement of fact or misrepresentation of credentials may result in disqualification from further consideration.

Signature [Signature]

Date 09/05/19

Applications are retained on file for one (1) year. Applicants are encouraged to include a letter of interest with this application. Thank you for your interest in serving Shawnee.

Send completed application to:

Shawnee City Clerk
PO Box 1448
Shawnee OK 74802
Phone 405-878-1605
Fax 405-878-1581
CityClerk@shawneeok.org

Regular Board of Commissioners

2. h.

Meeting Date: 09/16/2019

Lake Lease

Submitted By: Kacie Eck, City Clerk

Department: City Clerk

Information

Title of Item for Agenda

Lake Lease Transfer:

TRANSFER:

Lot 5 Seck Tract, 33800 Post Office Neck

From: Duwayne and Greta Colvin

To: James F. Ruth Sr. and Susan B. Ruth 2012 Revocable Trust

Attachments

Lake Lease



City of Shawnee
Community Development Department
222 N. Broadway
Shawnee, OK 74801
(405) 878-1665 Fax (405) 878-1587
www.ShawneeOK.org

**SHAWNEE TWIN LAKES CABIN SITE LEASES
SUMMARY/INSPECTION REPORT – FOR RENEWALS/TRANSFERS**

Date 9/16/19	License No. 033738
Type	☐ Renewal ☒ Transfer (Fee: \$1,000)
Commission Meeting Date	September 16, 2019
Property Address	33800 Post Office Neck
Lake Site Location	Lot 5 Seck Tract
Lease Dates	9/16/19-9/17/2049
Lease Fee (changes annually)	
Inspection Fee	\$75.00 Applicable: ☐ Yes ☒ No
Lessee (Transfer To)	
Name(s)	James F. Ruth Sr and Susan B. Ruth 2012 Revocable Trust
Address	SEE FILE
Phone	SEE FILE
Current Lessee (Transfer From) (if applicable)	
Name(s)	Duwayne and Greta Colvin
Address	SEE FILE
Phone	SEE FILE
Inspection Information	
Inspection Required	☐ Yes ☒ No (if no, due: 05-31-18)
DEQ Report on File	☒ Yes ☐ No
Type of Septic System	☒ Conventional ☐ Aerobic
Last Inspected/Pumped	08/09/17
Misc. Comments	Total Charges Paid: \$1717.00

PLEASE READ CAREFULLY

THIS LEASE IS NOT TRANSFERABLE AND IS SUBJECT TO CANCELLATION BY THE CITY FOR ANY VIOLATIONS OF THE TERMS THEREOF AS MORE SPECIFICALLY SET FORTH IN SECTION 16-326 OF THE SHAWNEE MUNICIPAL CODE:

**CABIN SITE LEASE
LEASE# 033738**

STATE OF OKLAHOMA, POTTAWATOMIE COUNTY, SS:

This Lease made and entered into in duplicate this date of September 16, 2019 by and between the CITY OF SHAWNEE, a municipal Corporation, PARTY OF THE FIRST PART, and

RUTH 2012 REVOCABLE TRUST
of 64 NORTHRIDGE RD SHAWNEE OK 74804-3263 ,
JAMES RUTH
of 64 NORTHRIDGE RD SHAWNEE OK 748043263,
PARTY OF THE SECOND PART.

WITNESSETH: That the first party in consideration of the sum of \$ 717.00 dollars for 2019, does hereby acknowledge receipt of the applicable rental fee, and other good and valuable considerations, does by these presents demise, lease and let unto the second party the following described real estate situated on, and a part of the site, owned by the first party as a City Reservoir and known as Shawnee Twin Lake No. 1, in the County of Pottawatomie State of Oklahoma, to-wit:

33800 POST OFFICE NECK

TO HAVE AND TO HOLD SAME UNTO the second party for a term of thirty (30) years from the date hereof.

IT IS FURTHER mutually understood and agreed by and between the parties hereto as follows:

The said party of the second part shall and will and does hereby agree to pay to the first party annual lease payments as set forth in "Exhibit A", payable yearly in advance. The City shall retain the right to adjust the lease rate schedule at the termination of the original 30-year lease or at such time that a transfer is approved in accordance with Section 16-321 of the Shawnee Municipal Code (hereafter "SMC").

That at the expiration of the primary term hereof, the lessee shall have the right and option to renew said lease for an additional period of thirty (30) years under the terms and

conditions set forth in Section 16-321 SMC. There is no limit to the number of times a lease can be renewed.

The premises of all lots leased by the City shall at all times be kept clean and maintained in a sanitary condition by the lessee. There is a 25-foot lakeshore buffer that extends landward of the ordinary high water mark on all leased lots for the purpose of watershed protection. This area shall not be used by the general public, except during an emergency situation. Within this buffer, leaseholders are encouraged to preserve existing native vegetation. Docks and other approved structures may be located within the buffer area. Fertilizers and other chemicals shall not be used within the buffer area. All other applicable City regulations and rules apply

That in addition to the possession of the property so leased, the lessee shall have the right and privilege of a site for a boat house and boat dock on the land owned by the City adjoining and immediately in front of a lot leased, which said boat house shall be erected and maintained by and at the cost of the lessee on ground not to exceed an area of thirty (30) feet by thirty (30) feet, which said boat house shall never be used as a place of human habitation, and which said boat house or boat dock shall conform to the provisions of Section 16-325 SMC, and that said boat dock or boat house shall be the private property of the lessee, who shall have the right of ingress and egress to and from the same, subject to the rights of the public as set forth herein. The lessee shall agree to keep said lot and boat house and dock in a clean and sanitary condition, and to maintain the same in a safe condition, and the City as lessor shall in no manner be liable to lessee for any damages suffered by lessee to said lot or boat house or dock, or the improvements thereon on account of the rise and fall of the water line of said lake, or for the enlargement or decrease by the City of the size of said lake, or on account of any rule or regulation that may hereafter be adopted by lessor, governing the regulations of said lake, and lessee agrees to hold the lessor free and harmless from all damages suffered by him or by any other person, on account of personal injuries or loss of property that may incur upon said lot, boat house or boat dock.

That the lessee agrees to lease the premises **AS IS** from the lessor with the knowledge and understanding that the lessor does not guarantee access to lots. Should the Lessee determine that an access road is necessary to reach his/her lot from a road already in existence, lessee agrees to use his/her own funds to create said access road. Lessee further agrees that upon access road completion it shall not be a private road, but rather, will be available for public use, including, but not limited to, allowing neighbor lots to connect to it to improve access to their lots or to allow joint access to bordering lots upon the one access road. The location of any access road to be constructed by the lessee must be approved by the City Engineer of the City of Shawnee prior to the beginning of construction.

That should the lessee construct any building or other structure, said construction will be in accordance to City of Shawnee development regulations. Lessee agrees that prior to commencing construction on any structure on the leased premises he/she will obtain an approved building permit from the City.

That lessee is solely responsible for determining the flood elevation on the leased premises and is required to satisfy lessor that prior to any construction on the leased premises the

determination of the flood elevation has been done correctly and that any structure or building to be constructed on the leased premises be above the flood elevation. **LESSOR EXPRESSLY MAKES NO WARRANTIES OR REPRESENTATIONS AS TO SAFETY FROM FLOODING ON THE LEASED PREMISES AND LESSEE EXPRESSLY RELEASES THE LESSOR FROM ANY LIABILITY DUE TO FLOOD DAMAGE, BOTH PERSONAL AND PROPERTY, OCCURRING ON THE LEASED PREMISES FROM ANY CAUSE OR CONDITION.**

That all sanitary facilities to be constructed on the premises shall be wholly contained on the leased premises. Sanitary facilities, include, but are not limited to, septic tanks and lateral lines.

All septic systems and waste disposal systems on leased lake lots shall be inspected and subject the standards set forth in Chapter 16 SMC. The leaseholder shall have sixty (60) days to correct any defects found in the system. Corrections not made within the allotted time shall be grounds for the City to cancel the lease of the leaseholder.

That no lease shall be assigned or sublet, but lessee may at any time during the term of his/her lease, sell and transfer to other parties the improvements on the lot leased by him/her.

That in the event of the sale of the improvements by the lessee, the transfer shall not become effective until approved by the Board of Commissioners of the City of Shawnee at a regular or adjourned meeting held for that purpose and the City as lessor reserves the right to reject and disapprove any transfer when in its opinion it would be to the best interests of the City and its inhabitants to do so. If the transfer is approved, a new lease shall be entered into between the purchaser and the City, and a transfer charge is hereby fixed and established in the sum of one-thousand dollars (\$1000.00) to be paid to the City prior to said transfer in accordance with Section 16-322 SMC.

That the lessee shall be the owner of all improvements which may be placed by him or her, said improvements including cabins or other buildings and boat houses constitute personal property and lessee shall have the right to remove same from the lot at the termination of the lease, subject to the following: whenever a lease has been cancelled by the City as provided herein or by ordinance, the lessee or owner of said improvements shall remove the same within sixty (60) days of the date of the said cancellation of the lease and upon failure to do so, said improvements shall revert to and become the property of the City of Shawnee. And it shall have the right, without further notice or demand to take immediate possession of all said improvements and these will belong to the first party or its assigns, as liquidated damages for the non-fulfillment of the lease by lessee and for the use and rental thereof.

That the said second party does hereby release the City of Shawnee of any claim or claims for damages by reason of the cancellation of the said lease aforesaid.

That the second party shall at all times during the term of this lease be subject to and does hereby agree to abide by and conform to any rules, regulations or ordinances now in force, or that may hereafter be adopted by the City of Shawnee, governing the regulation of said lake and

within the described premises, as to fishing, hunting, boating and other recreational activities upon and around said water reservoir, and to conform to and abide by all further rules, regulations and ordinances now in force, or that hereafter may be adopted by the City of Shawnee, Oklahoma, governing the regulations of said premises and lake.

The City Commission may upon a showing of intentional disregard for the terms of the lease and this division or other city ordinance pertaining to the lake, cancel the city lease upon 30 days notice to the lessee by mailing a copy of such notice to the lessee at his/her last known address. If a lease is cancelled either by the city or the lessee of a city-owned lot prior to the expiration of the lease term, the lessee shall pay the city an early termination fee of \$1,000 in exchange for a release of liability from the remaining term.

That this lease shall be binding upon the representatives, heirs, and assigns and successors in interest of the parties hereto.

It is understood by the parties hereto that a failure to comply with the terms of said Cabin Site Lease shall constitute a misdemeanor and any person, firm, or corporation convicted of such violation shall be punished by a fine not exceeding five hundred dollars (\$500.00) plus costs, or imprisonment for a term not exceeding thirty (30) days, or by such fine and imprisonment.

IN WITNESS WHEREOF, party of the first part has caused its name to be affixed hereto by the Mayor of the City of Shawnee, Oklahoma, and attested by the City Clerk, and the party of the second part hereunto affixed his/her name the day and year first above written.

CITY OF SHAWNEE, OKLAHOMA
A Municipal Corporation,

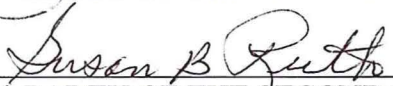
BY: _____
MAYOR
PARTY OF THE FIRST PART

ATTEST:

CITY CLERK



PARTY OF THE SECOND PART



PARTY OF THE SECOND PART

Regular Board of Commissioners

4.

Meeting Date: 09/16/2019

P15-19 Rezoning

Submitted By: Kacie Eck, City Clerk

Department: City Clerk

Information

Title of Item for Agenda

Public hearing and consideration of an ordinance to rezone property located at 306 East 45th Street from A-1 (Rural Agricultural District) to C-3 (Highway Commercial District) for the purpose of a commercial development. Case No. P15-19, Applicant: Andrew Landes.

Attachments

Staff Report

Ordinance

RECOMMENDATION TO:

MAYOR
BOARD OF CITY COMMISSIONERS
CITY OF SHAWNEE

RECOMMENDATION FROM:

CITY OF SHAWNEE
PLANNING COMMISSION

SUBJECT:

APPLICANT: Andrew & Katie Landes

FOR: Rezone

LOCATION: 306 East 45th Street, Shawnee, OK

PROJECT#: 190682 Case# P15-19

LEGAL DESCRIPTION:

The South 4 acres of the W/2 E/2 SW SE of Section 31 T11N, R4E

CURRENT CLASSIFICATION: A-1 (Rural Agricultural)

REQUESTED CLASSIFICATION: C-3 (Highway Commercial)

PROPOSED PROPERTY USE: Commercial

PLANNING COMMISSION MEETING DATE: September 4th, 2019

PLANNING COMMISSION RECOMMENDATION: Motion to approve:

VOTE OF THE PLANNING COMMISSION:

MEMBERS PRESENT: 5

MEMBERS:	1ST	2ND	AYE	NAY	ABSTAIN	COMMENTS
DEEM			X			
MATTHEWS	X		X			
WALKER			X			
BERGSTEN (CHAIRMAN)						ABSENT
ROWELL						ABSENT
KIENZLE			X			
MELOT		X	X			

RESPECTFULLY SUBMITTED,

Joseph Barker

SECRETARY, PLANNING COMMISSION

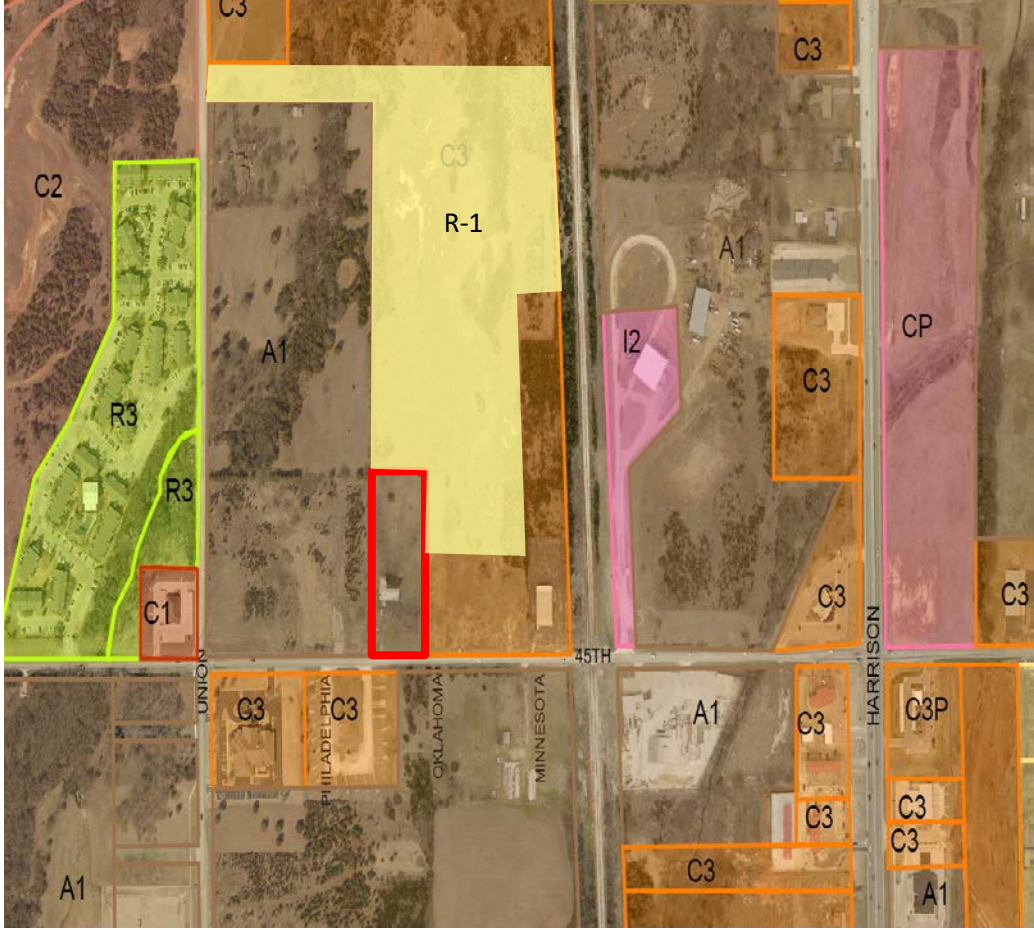
ACTION BY CITY COMMISSION:

PUBLIC HEARING SET: _____

DATE OF ACTION: _____

ADOPTED _____ DENIED _____

ORDINANCE NO. _____

City of Shawnee Planning Department 222. N. Broadway Shawnee, OK 74801 (405) 878-1616 Fax: (405) 878-1587 www.ShawneeOK.org			CASE # P15-19 PUBLIC HEARING DATE: September 4th, 2019 CITY COMMISSION DATE: September 16th, 2019	
APPLICANT: Andrew & Katie Landes		1805 Pecan Crossing Shawnee, Oklahoma, 74804		Landes-andrew@yahoo.com
PROPERTY ADDRESS/LOCATION: 306 East 45th Street, Shawnee, Oklahoma, 74804				
The applicants, Andrew and Katie Landes, are requesting a rezone from A-1 to C-3 at 306 East 45th Street, a 4.01-acre parcel. The stated proposed use is for a commercial development.				
EXISTING ZONING: A-1	EXISTING LAND USE: Single-Family Residential	SURROUNDING ZONING & LAND USE: A-1 (Rural Agricultural) R-1 (Single-Family Residential) C-3 (Highway Commercial)	SUBDIVISION: N/A	PROPERTY SIZE: 4.01 acres

STAFF RECOMMENDATION

The applicants have stated they intend to use the lot for a commercial development. The subject site is roughly 4.01 acres in size. Adjacent properties are zoned A-1 (Rural Agricultural), R-1 (Single-Family Residential), and C-3 (Highway Commercial). The 2005 Comprehensive Plan states this area's intended use should be commercial/residential. Therefore, this proposed rezone abides by the intentions of the Comprehensive Plan.

The rezone is required to conform to Section 22-165.2 of the Zoning Code, "Uses [in commercial districts]," which assures that the C-3 zoning district is used to provide for establishments offering accommodations, supplies or services to motorists, and for certain specialized uses such as retail outlets, extensive commercial amusement and service establishments. Because the applicant has not defined a specific use for the rezone, it will be the applicant's responsibility to be informed on what uses are permitted in the C-3 District. The rezone is also required to conform to Section 22-165.4 of the Zoning Code, "Dimensional Standards [in commercial districts]." If rezoned to C-3, it would conform to these standards.

No letters of support or objection have been received regarding this application.

The subject request is in conformance with City Zoning Code and fits the general pattern of development in the area; therefore, Staff hereby recommends approval of the requested rezone from A-1 (Rural Agricultural) to C-3 (Highway Commercial).

APPROVE

APPROVE WITH CONDITIONS

DENY

ATTACHMENTS:
(CIRCLE)

SUBMITTED PLANS

PUBLIC HEARING
PETITION/
APPLICATION
FORM

LEGAL NOTICE

LEGAL DESCRIPTION

PUBLIC COMMENTS

AGENCY COMMENTS

RESPONSE TO STANDARDS



PLANNING COMMISSION APPLICATION

Planning Department

222 N. Broadway
Shawnee, OK 74801
(405) 878-1616 Fax (405) 878-1587
www.ShawneeOK.org

For Office Use Only	
Case Number:	<u>15-19</u>
Project Number:	<u>190682</u>
Date Filed:	<u>8-1-2019</u>
_____ Planning Commission Secretary	

REQUEST:

☒ Rezoning
☐ Conditional Use Permit
☐ Rezoning w/Conditional Use Permit
☐ Planned Unit Development

I, the undersigned, do hereby respectfully make application and petition to the City Commission to amend the zoning map, and to change the zoning district of the Shawnee area, from A-1 District to C-3 District, as hereinafter requested, and in support of this application, the following facts are shown:

PROPERTY LOCATION (STREET ADDRESS): 306 E. 45th St.

LEGAL DESCRIPTION: 93-SU S 4A W 1/2 E 1/2 SW SE

PROPERTY OWNER (S): Royal Land Properties, LLC *Contingent on Rezoning

PROPERTY AGENT (APPLICANT): Andrew and Katie Landes

APPLICANT'S ADDRESS: 1805 Pecan Crossing

CITY: Shawnee STATE: OK ZIP: 74804

EMAIL ADDRESS: landes-andrew@yahoo.com

TELEPHONE NUMBER: (405) 535-3618 CONTACT NUMBER: (405) 535-3618 / 214-0300

DIMENSIONS OF PROPERTY: AREA: _____ WIDTH: _____
LENGTH: _____ FRONTAGE: _____

CURRENT ZONING: A-1 CURRENT USE: A-1

PROPOSED ZONING: C-3 PROPOSED USE: C-3

With the filing of this application, I acknowledge that I have been informed of off-street parking, fencing and paving requirements in regard to the zoning I have requested as witnessed by my signature.

APPLICATION, OFFICIAL OWNERSHIP LIST AND PAYMENT
MUST BE RECEIVED 30 DAYS PRIOR TO MEETING

[Signature]
SIGNATURE OF APPLICANT

FOR STAFF USE ONLY

REZONING &/OR C.U.P FEE \$ 280.00
RECEIPT NO. 02323459

PLANNED UNIT DEVELOPMENT FEE \$ 550.00
SIGN DEPOSIT \$ 50.00

(Refundable if Applicant returns 48 hrs. after City Commission Meeting)

PLANNING COMMISSION ACTION: _____ DATE: _____

CITY COMMISSION ACTION: _____ DATE: _____

PLACE ON ZONING MAP: _____ ORDINANCE NO.: _____

RECORD CHECK

LEGAL DESCRIPTION:

SURFACE ONLY:

The South 4 acres of the W/2 E/2 SW SE of Section 31 T11N, R4E

NAMES:

Hubert D. Peery and Annelee M. Peery

Choice Title & Abstracting has reviewed the records of the Office of the County Clerk of Pottawatomie County, and discloses that they find the following record owners to own property within 300 feet of the subject property:

1. Royal Land Properties, LLC
1805 Pecan Crossing Dr.
Shawnee, OK 74804

A tract in the W/2 SW/4 SE/4 Beginning 412.5 feet East of the SW/C of the W/2 SW/4 SE/4; East 247.5 feet; North 526.8 feet; West 247.5 feet; South 526.8 feet to the POB

2. Royal Land Properties, LLC
1805 Pecan Crossing Dr.
Shawnee, OK 74804

A tract Beginning at the SW/C W/2 SW/4 SE/4; East 412.5 feet; North 526.8 feet; West 412.5 feet; South 526.8 feet to POB

3. Margie Ston and Donna Parmer
4731 N. Union
Shawnee, OK 74804

The North 12 acres of the W/2 SW/4 SE/4 Beginning SW/C NW/4 SE/4; North 285 feet; East 660 feet; South 285 feet; West 660 feet to POB

4. Ricky L. & Kimberly S. Floyd
130 Nicholson Rd.
Searcy, AR 72143

Beginning NW/C SE/4 South 60.57 to POB East 1389.72 feet to the West Line of AT&SF RR; S2°44'42"E 890.4 feet; West 1131.44 feet; North 315 feet; West 315 feet; North 567.65 feet to POB

5. Dreamcatchers Dance Company, LLC
650 E. 45th St.
Shawnee, OK 74804

Beginning SE/C SW/4 SE/4 East 151.5 feet to the West R/W of RR Northwesterly 896.6 feet; West 140 feet; Southeasterly 896.6 feet to POB

6. Central Church of Christ
c/o Bob Perry
1936 N. Union
Shawnee, OK 74804

Williams Addition the East 4 acres in Block 5 described as Beginning 33 feet South and 1002 feet East of the NW/C NE thence South 365.5 feet; East 478 feet; NW 365.5 feet; West 475 feet to POB

7. Central Church of Christ
c/o Bob Perry
1936 N. Union
Shawnee, OK 74804

Williams Addition Beginning 33 feet South & 763.7 feet East of the NW/C NE South 365.5 feet;
East 238.3 feet; North 356.5 feet; West 238.3 feet in Section 6 T10N, R4E.

8. John A. Barrett Jr.
1210 Gordon Cooper Dr.
Shawnee, OK 74801

Williams Addition A Part of Block 5 beginning 33 feet South & 406.3 East of the NW/C NE East
357.4 feet; South 365.5 feet; West 357.4 feet; North 365.5 feet to POB

9. Threep LLC
201 E. 45th St.
Shawnee, OK 74804

Williams Addition a Part of Block 5 beginning 33 feet South & 30 feet East of the NW/C NE East
376.30 feet; South 365.60 feet; West 376.30 feet; North 367.50 feet to POB LESS & Except Lots
1-10 and Lots 21-32 all inclusive in Block 53 Armourdale Addition.

This check covers the 300 feet of surrounding property associated with the subject property.

We have prepared the above summary of our records with the same measure of care used in the preparation of abstracts, however this is the only summary of the instruments on file and of record and is not intended to express or imply an opinion as to the legal effect of those instruments or status of title. We assume no liability in connection with this written interim record check beyond that of due care. Any party using this report as the basis of a real estate transaction does so at their own risk.

CHOICE TITLE & ABSTRACTING


Pamela L. Atyia, No. 4644

Order No.: 9603



City of Shawnee OK
405-878-1616

REC#: 02323459 8/07/2019 10:15 AM
OPER: KG TERM: 020
REF#: 6909
PAID BY:

TRAN: 401.0000 BUILDING PERMIT
190682 280.00CR
LANDES, ANDREW
306 E 45TH ST
Z-REZONING 280.00CR

TENDERED: 280.00 CHECK
APPLIED: 280.00-

CHANGE: 0.00

Visit www.ShawneeOK.org
For More Information

CITY OF SHAWNEE
PUBLIC HEARING NOTICE
CASE #P15-19

Notice is hereby given that the City of Shawnee, Oklahoma, will conduct a public hearing on a proposed rezone of property located within the City of Shawnee.

The property requesting rezoning is described as follows:

The South 4 acres of the W/2 E/2 SW SE of Section 31 T11N, R4E.

General Location Known As:

306 East 45th Street, Shawnee, Oklahoma, 74804

Current Zoning Classification:

A-1 (Rural Agricultural)

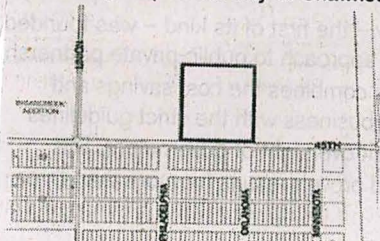
Requested Zoning Classification:

C-3 (Highway Commercial)

Proposed Use of Property: Commercial

Applicant: Andrew Landes

The "Zoning Map of the City of Shawnee,



Oklahoma" will be amended accordingly to reflect such change if approved by the City Commission.

The public hearing will be held in the City Commission Chambers in City Hall, 16 W. 9th St. Shawnee, Oklahoma, as follows:

September 4th, 2019 AT 1:30 P.M.:

CITY OF SHAWNEE PLANNING COMMISSION

September 16th, 2019 AT 6:00 P.M.:

CITY OF SHAWNEE CITY COMMISSION

At this time any interested citizen of Shawnee, Oklahoma will have the opportunity to appear and be heard with regard to the rezone. The Commission reserves the right to limit discussion and debate on the proposed rezone in the public hearing, in which event those persons appearing in support or opposition of the proposed rezone will be allotted equal time. Any formal protest must be filed in writing with the City Clerk during normal working hours before 5:00 p.m. a minimum of three (3) days prior to the hearing. If there are any questions about the proposal, or you need additional information prior to the public hearing, please contact the Planning Department at 405-878-1616. A copy of the application is available for public inspection during normal working hours in the Planning Secretary's office at 222 N. Broadway.

Witness my hand this 14th day of August, 2019.

Lisa Lasyone, City Clerk
(Published in the Shawnee News-Star on Aug. 18th, 2019)

Affidavit of Publication

The Shawnee News-Star

215 N. Bell

Shawnee OK 74801

(405) 273-4200

State of Oklahoma

County of Pottawatomie

I, Wanda Westerman, of lawful age, being duly sworn upon oath, deposes and says that I am the Legal Advertising Account Executive of The Shawnee News-Star, a Daily publication that is a "legal newspaper" as that phrase is defined in 25 O.S. §106 for the City of Shawnee, for the County of Pottawatomie, in the State of Oklahoma, and that the attachment hereto contains a true and correct copy of what was actually published in said legal newspaper in consecutive issues on the following date(s):

Insertion Date(s): Aug., 18th, 2019

Publishing Fee: \$89.90

Wanda Westerman, Account Executive

Signed and sworn to before me this 19th day of Aug., 2019.

Cayla Medley, Notary Public

My Commission Expires: March 6th, 2022

Commission No. 18002252



CAYLA MEDLEY
Notary Public
State of Oklahoma
Commission #18002252
My Comm. Expires 3/6/2022

Advertising Receipt

Shawnee News Star
P.O. Box 1688
Shawnee, OK 74802-1688

Phone: 405-273-4200
Fax: 405-273-4207

City of Shawnee - LEGALS

P.O. Box 1448
SHAWNEE, OK 74802

Acct #: 05111006

Ad #: 00165704

Phone: (405)273-1250

Date: 08/14/2019

Ad taker: WW

Salesperson:

Classification: 1000

Description	Start	Stop	Ins.	Cost/Day	Extras	Total
PO#19-0301	08/18/2019	08/18/2019	2	42.45	5.00	89.90

Ad Text:

CITY OF SHAWNEE
PUBLIC HEARING NOTICE
CASE #P15-19

Payment Reference:

Notice is hereby given that the City of Shawnee, Oklahoma, will conduct a public hearing on a proposed rezone of property located within the City of Shawnee.

The property requesting rezoning is described as follows:

The South 4 acres of the W/2 E/2 SW SE of Section 31 T11N, R4E.

General Location Known As:

306 East 45th Street Shawnee Oklahoma 74804

Total: 89.90

Tax: 0.00

Net: 89.90

Prepaid: 0.00

Total Due 89.90

ORDINANCE NO. _____NS

AN ORDINANCE CONCERNING THE ZONING CLASSIFICATION OF THE FOLLOWING DESCRIBED PROPERTY LOCATED WITHIN THE CORPORATE LIMITS OF THE CITY OF SHAWNEE, POTTAWATOMIE COUNTY, OKLAHOMA, TO-WIT: THE SOUTH FOUR ACRES OF THE W/2 E/2 SW SE OF SECTION 31, TOWNSHIP 11 NORTH, RANGE 4 EAST, FROM ZONING CLASSIFICATION A-1 (RURAL AGRICULTURAL DISTRICT) TO C-3 (HIGHWAY COMMERCIAL DISTRICT) AND AMENDING THE OFFICIAL ZONING MAP OF THE CITY OF SHAWNEE ACCORDINGLY.

WHEREAS, pursuant to notice duly given as required by law, a public hearing conducted by the Board of Commissioners of the City of Shawnee, Oklahoma on the 16th day of September, 2019, upon an application to rezone certain properties located in the City of Shawnee, Oklahoma, from zoning classification A-1 (Rural Agricultural District) to C-3 (Highway Commercial District).

WHEREAS, the Planning Commission of the City of Shawnee has conducted one or more public hearings on said application pursuant to notice as required by law and has submitted its final report and recommendation upon said application to the Board of Commissioners; and,

WHEREAS, it appears to be in the best interest of the City of Shawnee and the inhabitants thereof for said properties to be rezoned to C-3 (Highway Commercial District).

NOW, THEREFORE, BE IT ORDAINED BY THE BOARD OF COMMISSIONERS OF THE CITY OF SHAWNEE, OKLAHOMA:

SECTION 1: That the following described property located in the City of Shawnee, Oklahoma, to-wit: THE SOUTH FOUR ACRES OF THE W/2, E/2, SW, SE OF SECTION 31, TOWNSHIP 11 NORTH, RANGE 4 EAST, FROM ZONING CLASSIFICATION A-1 (RURAL AGRICULTURAL DISTRICT) TO C-3 (HIGHWAY COMMERCIAL DISTRICT) AND AMENDING THE OFFICIAL ZONING MAP OF THE CITY OF SHAWNEE ACCORDINGLY.

PASSED AND APPROVED this 16th day of September, 2019.

RICHARD FINLEY, MAYOR

(SEAL)
ATTEST:

LISA LASYONE, CMC, CITY CLERK

Approved as to form and legality this 16th day of September, 2019.

JOSEPH M. VORNDRAN,
CITY ATTORNEY

Regular Board of Commissioners

5.

Meeting Date: 09/16/2019

Final Plat

Submitted By: Kacie Eck, City Clerk

Department: City Clerk

Information

Title of Item for Agenda

Consideration of approval of a final plat for Domino Plaza Addition, Section 2 located on the southeast corner of North Harrison Avenue and John C. Bruton Boulevard for the purpose of commercial retail development. Case No. S07-19, Applicant: Shawnee Harrison, LLC.

Attachments

Final Plat

RECOMMENDATION TO:

MAYOR
BOARD OF CITY COMMISSIONERS
CITY OF SHAWNEE

RECOMMENDATION FROM:

CITY OF SHAWNEE
PLANNING COMMISSION

SUBJECT:

APPLICANT: Shawnee Harrison, LLC
FOR: Amended Final Plat for Domino Plaza, Section 2
LOCATION: SE corner of Harrison & John C. Bruton
PROJECT# 190413 CASE# S07-19

A tract of land lying in the West Half of the Southwest Quarter (W/2 SW/4) of Section Thirty-two (32), Township Eleven (11) North, Range Four (4) East of the Indian Meridian, Pottawatomie County, Oklahoma being more particularly described as follows: COMMENCING at southwest corner of said Southwest Quarter; thence North 89°26'29"East, along the south line of said Southwest Quarter, a distance of 150.08 feet to a point on the east right of way line of Harrison Avenue (State Highway 18) as established by WARRANTY DEED recorded in Book 400, Page 329; THENCE along said right of way line, the following Five (5) courses: 1. North 00°42'25"West, passing at a distance of 50.00 feet the southwest corner of Lot 1, DOMINO PLAZA ADDITION SECTION 1, recorded in Plat Cabinet C, Page 191, and continuing along the west line of Lot 1 and Lot 2 of said plat for a total distance of 704.00 feet; 2. South 89°17'35"West a distance of 10.00 feet to a point on said right of way line as established by DEDICATION DEED PUBLIC HIGHWAY recorded in Book 164, Page 106; 3. North 00°42'25"West, passing at a distance of 26.77 feet the southwest corner of Common Area 'B' of said DOMINO PLAZA ADDITION SECTION 1, and continuing for a total distance of 190.23 feet to the northwest corner of said Common Area 'B' and the POINT OF BEGINNING; 4. Continuing North 00°42'25" West a distance of 764.29 feet; 5. North 10°13'16"East a distance of 191.27 feet; THENCE North 89°17'35"East a distance of 278.92 feet to a point of curvature; THENCE Easterly along a curve to the left having a radius of 458.08 feet (said curve subtended by a chord which bears North 86°07'50"East a distance of 50.54 feet) for an arc distance of 50.57 feet; THENCE South 00°01'41" West, parallel with the west line of said Southwest Quarter, a distance of 936.91 feet to the northeast corner of said Common Area 'B'; THENCE along the northerly line of said Common Area 'B', the following Three (3) courses: 1. South 89°17'09"West a distance of 100.00 feet; 2. South 00°01'41"West a distance of 18.00 feet; 3. South 89°17'04"West a distance of 253.40 feet to the POINT OF BEGINNING. Said described tract of land contains an area of 337,114 square feet or 7.7391 acres, more or less

PLANNING COMMISSION MEETING DATE: September 4th, 2019

PLANNING COMMISSION RECOMMENDATION: Approval

VOTE OF THE PLANNING COMMISSION:

MEMBERS PRESENT: 5

MEMBERS:	1ST	2ND	AYE	NAY	ABSTAIN	COMMENTS
DEEM		X	X			
MATTHEWS	X		X			
WALKER			X			
BERGSTEN (CHAIRMAN)						ABSENT
ROWELL						ABSENT
KIENZLE			X			
MELOT			X			

RESPECTFULLY SUBMITTED,

Joseph Barker

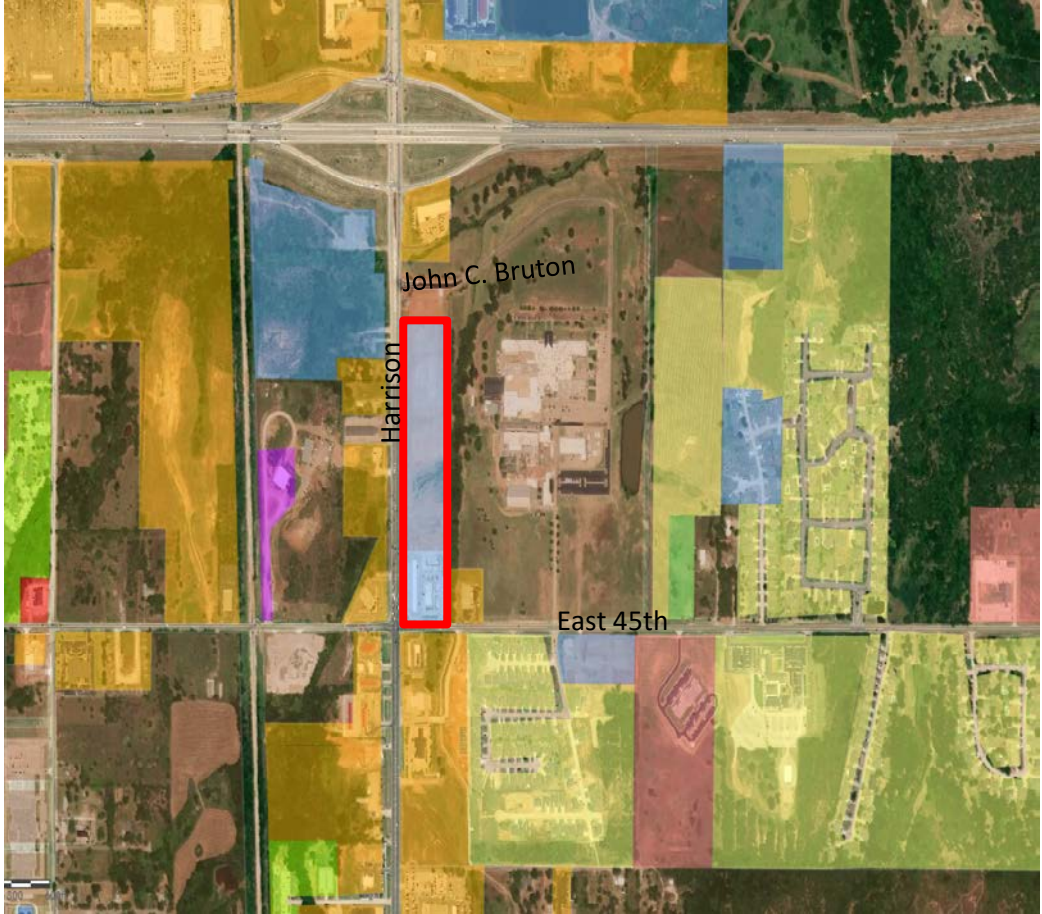
SECRETARY, PLANNING COMMISSION

ACTION BY CITY COMMISSION:

PUBLIC HEARING SET: _____

DATE OF ACTION: _____

ADOPTED _____ DENIED _____

City of Shawnee Planning Department 222. N. Broadway Shawnee, OK 74801 (405) 878-1616 Fax: (405) 878-1587 www.ShawneeOK.org			CASE # S07-19 PUBLIC HEARING DATE: August 7th, 2019 CITY COMMISSION DATE: August 19th, 2019	
APPLICANT: Shawnee Harrison, LLC		1715 South Highway 183 Clinton, Oklahoma, 73601		msmith@elmersmithoil.com
PROPERTY ADDRESS/LOCATION: Southeast Corner of Harrison & John C. Bruton Boulevard				
The applicant, Shawnee Harrison, LLC, is requesting approval for an amended final plat for Domino Plaza Addition, Section 2, a 7.74-acre property. The amended final plat reduces the number of lots in this section from three (3), which is the number the Preliminary Plat had, to two (2).				
EXISTING ZONING: PUD	EXISTING LAND USE: Vacant	SURROUNDING ZONING & LAND USE: A-1 (Rural Agricultural) C-3 (Highway Commercial)	LOTS: 2	PROPERTY SIZE: 7.74 acres

STAFF RECOMMENDATION

In 2016, this property was approved for a rezone to a PUD with an underlying zoning of C-3 with the following restrictions:

- Front yard setbacks for Lots 1 & 5 – 50’;
- Front yard setbacks for Lots 2-4 – 75’;
- Rear yard setbacks for all lots – 30’; and
- Side yard setbacks – All lots – 25’.

Square footage and lot width restrictions are standard for C-3 (10,000’ square feet of area, and 100’ of lot width). The final plat meets all these restrictions.

Final plats are required to abide by the standards of the City of Shawnee Subdivision Regulations. Article VIII, Platting Procedures, Section 3, General Requirements [of Final Plat], Subsection 5, Contents of Final Plat, provides a list of information that must be submitted on the Final Plat for a Final Plat to be approved. The submitted Final Plat meets these requirements.

The 2005 Comprehensive Plan designates the future use of this area to be public/commercial. Being a recently approved PUD, the Final Plat is permissible.

The Planning Department has received the following feedback from the following agencies:

Engineering/Streets:

No issues.

Shawnee Municipal Authority:

No issues.

Fire Department:

No issues.

The subject request is in conformance with the City Zoning Code and Subdivision Code; therefore, Staff hereby recommends approval of the requested amended final plat for Domino Plaza Addition, Section 2.

APPROVE

APPROVE WITH CONDITIONS

DENY

**ATTACHMENTS:
(CIRCLE)**

SUBMITTED PLANS

**PUBLIC HEARING
PETITION/
APPLICATION FORM**

LEGAL NOTICE

LEGAL DESCRIPTION

PUBLIC COMMENTS

AGENCY COMMENTS

RESPONSE TO STANDARDS

AMENDED FINAL PLAT
DOMINO PLAZA ADDITION SECTION 2
A Part of the West Half of the S.W. Quarter, Section 32, T. 11 N., R. 4 E., I.M.
Shawnee, Pottawatomie County, Oklahoma

OWNER'S CERTIFICATE AND DEDICATION

Know All Men By These Presents:

That Shawnee Harrison LLC hereby certify it is the owners of, and the only person, firm corporation, or entity having any ownership rights, title or interest in and to the land shown on the annexed plat of DOMINO PLAZA ADDITION SECTION 2, an Addition to the City of Shawnee, Pottawatomie County, Oklahoma, and has caused the same to be platted into lots, blocks, streets, and easements as shown on said annexed plat.

Shawnee Harrison LLC hereby dedicate all rights of way and easements as shown on said annexed plat to the public for streets, fire protection, utility and drainage easements, for itself, its successors and assigns forever and has caused the same to be released from all rights, easements, and encumbrances except as noted on the Bonded Abstractor's Certificate.

Covenants, Conditions and Restrictions for the annexed plat may be filed under separate instrument.

In witness whereof the undersigned having caused this instrument to be executed this _____ day of _____, 2019.

By: _____

STATE OF OKLAHOMA
SS
COUNTY OF _____

Before me, a Notary Public in and for said State, on the above stated date, personally appeared _____, to me know to be the identical person who executed the within and foregoing instrument and acknowledge to me that he executed the same as his free and voluntary act and deed for said corporation for the uses and purposes therein set forth.

Notary Public

My Commission Expires: _____ Commission Number: _____

CERTIFICATE OF CITY CLERK

I, _____, City Clerk of the City of Shawnee, Pottawatomie County, Oklahoma, hereby certify that I have examined the records of said City and find that all deferred payments on unmatured installments upon special assessments have been paid in full and that there are no special assessment procedures now pending against the land shown on the annexed plat.

Signed by the City Clerk this _____ day of _____, 2019.

_____, City Clerk

CITY PLANNING COMMISSION APPROVAL

I, _____, Chairperson of the Planning Commission of the City of Shawnee, Pottawatomie County, Oklahoma, hereby certify the Planning Commission duly approved the annexed plat at a Planning Commission meeting on the _____ day of _____, 2019.

_____, Chairperson

COUNTY TREASURER'S CERTIFICATE

I, _____, do hereby certify that I am the duly qualified and acting County Treasurer of Pottawatomie County, Oklahoma, that the tax records of said county show that all taxes for the year _____, and prior years are paid on the property outline on the annexed plat and the required statutory security has been deposited in the offices of the Pottawatomie County Treasurer guaranteeing the payment of the current year's taxes.

In witness whereof, said County Treasurer has caused this instrument to be executed this _____ day of _____, 2019.

_____, County Treasurer

ACCEPTANCE OF DEDICATION

Be it resolved by the City Council of the City of Shawnee, Pottawatomie County, Oklahoma, the dedications shown on the annexed plat are hereby accepted.

Adopted by the Council of the City of Oklahoma City, this _____ day of _____, 2019.

_____, City Clerk

_____, Mayor

BONDED ABSTRACTOR'S CERTIFICATE

The undersigned, a duly qualified and lawfully bonded abstractor of titles in and for Pottawatomie County and State of Oklahoma, hereby certifies the records of said county show that title to the land shown on the annexed plat is vested in Shawnee Harrison LLC on this _____ day of _____, 2019, and there are no actions pending or judgments of any nature of any court or on file with the clerk of any court in said county and state against said land or owners thereof, and the taxes are paid for the year of 20_____, and prior years, and there are no outstanding tax sales certificates against said land, and no tax deeds are issued to any person, and there are no liens, or other encumbrances of any kind against the land included in the annexed plat, except, mortgages, rights of way, easements, and mineral conveyances of record.

In witness whereof, said Bonded Abstractor has caused this instrument to be executed this _____ day of _____, 2019.

PROFESSIONAL SURVEYOR'S CERTIFICATE

I, Randall A. Mansfield, do hereby certify that I am a Licensed Professional Land Surveyor in the State of Oklahoma, and that the annexed plat, consisting of two (2) sheets, represents a survey made under my supervision on the _____ day of _____, 2019, and that monuments shown thereon exist and their positions are correctly shown and this survey meets the Oklahoma Minimum Standards for the Practice of Land Surveyors as adopted by the Oklahoma State Board of Licensure for Professional Engineers and Land Surveyors and the original media of said annexed plat Final Plat complies with the requirements of Title 11 Section 41-108 of the Oklahoma State Statutes.

Randall A. Mansfield, PLS 1613

STATE OF OKLAHOMA
SS
COUNTY OF OKLAHOMA

This instrument was acknowledged before me on the _____ day of _____, 2019, by Randall A. Mansfield.

Notary Public

My Commission Expires: 2/13/23 Commission Number: 15001535



PLAT PERIMETER DESCRIPTION

A tract of land lying in the West Half of the Southwest Quarter (W/2 SW/4) of Section Thirty-two (32), Township Eleven (11) North, Range Four (4) East of the Indian Meridian, Pottawatomie County, Oklahoma being more particularly described as follows:

COMMENCING at southwest corner of said Southwest Quarter;

THENCE North 89°26'29" East, along the south line of said Southwest Quarter, a distance of 150.08 feet to a point on the east right of way line of Harrison Avenue (State Highway 18) as established by WARRANTY DEED recorded in Book 400, Page 329;

THENCE along said right of way line, the following Five (5) courses:

1. North 00°42'25" West, passing at a distance of 50.00 feet the southwest corner of Lot 1, DOMINO PLAZA ADDITION SECTION 1, recorded in Plat Cabinet C, Page 191, and continuing along the west line of Lot 1 and Lot 2 of said plat for a total distance of 704.00 feet;
2. South 89°17'35" West a distance of 10.00 feet to a point on said right of way line as established by DEDICATION DEED PUBLIC HIGHWAY recorded in Book 164, Page 106;
3. North 00°42'25" West, passing at a distance of 26.77 feet the southwest corner of Common Area 'B' of said DOMINO PLAZA ADDITION SECTION 1, and continuing for a total distance of 190.23 feet to the northwest corner of said Common Area 'B' and the POINT OF BEGINNING;
4. Continuing North 00°42'25" West a distance of 764.29 feet;
5. North 10°13'16" East a distance of 191.27 feet;

THENCE North 89°17'35" East a distance of 278.92 feet to a point of curvature;

THENCE Easterly along a curve to the left having a radius of 458.08 feet (said curve subtended by a chord which bears North 86°07'50" East a distance of 50.54 feet) for an arc distance of 50.57 feet;

THENCE South 00°01'41" West, parallel with the west line of said Southwest Quarter, a distance of 936.91 feet to the northeast corner of said Common Area 'B';

THENCE along the northerly line of said Common Area 'B', the following Three (3) courses:

1. South 89°17'09" West a distance of 100.00 feet;
2. South 00°01'41" West a distance of 18.00 feet;
3. South 89°17'04" West a distance of 253.40 feet to the POINT OF BEGINNING.

Said described tract of land contains an area of 337,114 square feet or 7.7391 acres, more or less.

The bearing of North 89°26'29" East as the south line of the Southwest Quarter of Section 32, Township 11 North, Range 4 East of the Indian Meridian as shown on the plat of DOMINO PLAZA ADDITION SECTION 1 was used as the basis of bearings for this plat.

OWNERS NOTARY

OWNERS NOTARY

OWNERS NOTARY

OWNERS NOTARY

CITY CLERK

COUNTY TREASURER

ABSTRACTOR

ABSTRACTOR'S NOTARY



SURVEYOR'S NOTARY

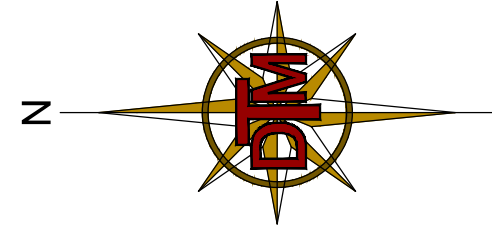


DODSON - THOMPSON - MANSFIELD, PLLC

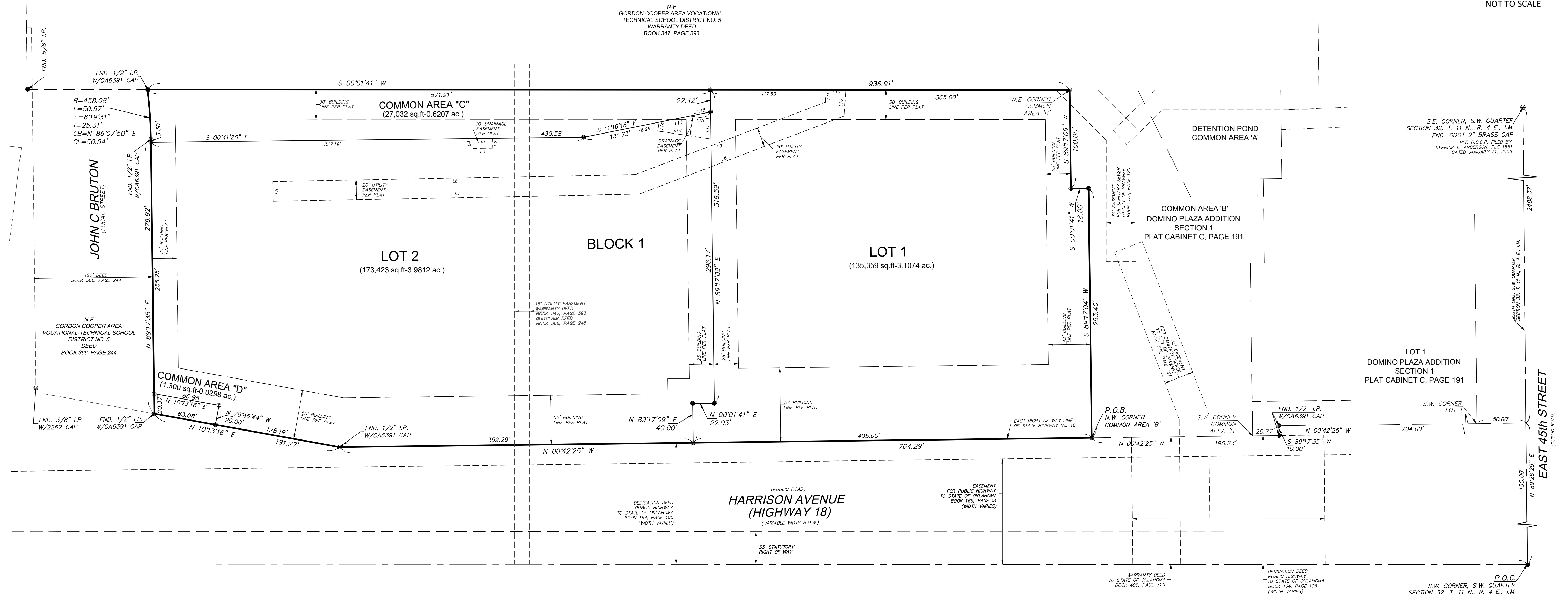
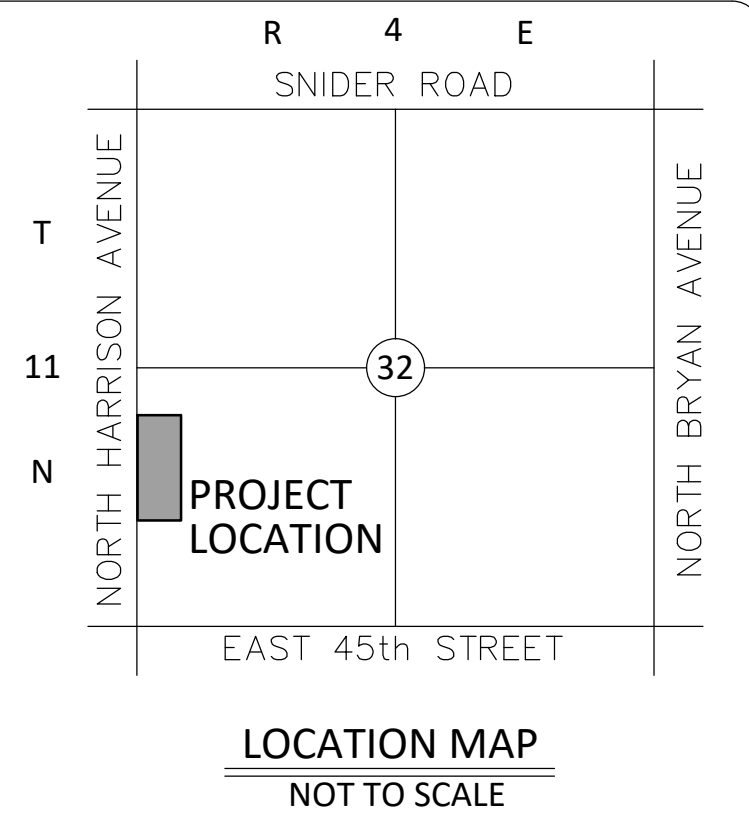
20 NE 38th Street Phone: 405-601-7402 email: randym@dtm-ok.com
Oklahoma City, OK 73105 Fax: 405-601-7421

Surveying - Engineering - Earthwork

CERTIFICATE OF AUTHORIZATION NO: 6391 EXPIRES JUNE 30, 2020



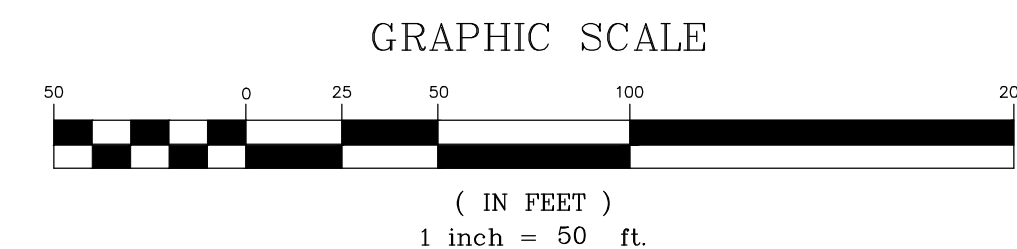
AMENDED FINAL PLAT
DOMINO PLAZA ADDITION SECTION 2
A Part of the West Half of the S.W. Quarter, Section 32, T. 11 N., R. 4 E., I.M.
Shawnee, Pottawatomie County, Oklahoma



Easement Line Table		
Line #	Direction	Length
L1	S 00°41'20" E	20.00
L2	S 89°17'35" W	10.00
L3	N 00°41'20" W	20.00
L4	N 89°17'35" E	10.00
L5	N 88°52'34" E	20.00
L6	S 01°07'26" E	368.55
L7	N 01°07'26" W	372.03
L8	N 20°52'21" W	222.74
L9	S 20°52'21" E	206.39
L10	N 86°25'32" W	26.56

Easement Line Table		
Line #	Direction	Length
L11	S 86°25'32" E	12.44
L12	S 00°01'41" W	20.04
L13	S 11°16'18" E	32.29
L14	S 81°24'52" E	9.03
L15	N 08°35'08" E	54.75
L16	S 08°35'08" W	21.10
L17	S 89°17'09" W	20.27

UNLESS OTHERWISE STATED ALL
MONUMENTS ARE SET 1/2" IRON
PINS WITH CA6391 CAPS OR SET
MAG NAILS WITH CA6391 TAGS



 **DODSON - THOMPSON - MANSFIELD, PLLC**
20 NE 38th Street Phone: 405-601-7402 email: randym@dtm-ok.com
Oklahoma City, OK 73105 Fax: 405-601-7421
Surveying - Engineering - Earthwork
CERTIFICATE OF AUTHORIZATION NO: 6391 EXPIRES JUNE 30, 2020

[illegible][illegible]

SANITARY SEWER PLANS

TO SERVE

DOMINO PLAZA

A PART OF THE SW/4 OF SEC. 32, T-11-N, R-4-E, I.M.
SHAWNEE, POTTAWATOMIE COUNTY, OKLAHOMA

GENERAL NOTES:

1. THE CONTRACTOR SHALL SATISFY HIMSELF CONCERNING THE ACCURACY OF ALL MEASUREMENTS BEFORE CONSTRUCTING ANY PERMANENT STRUCTURE.
2. THE CONTRACTOR SHALL BE RESPONSIBLE FOR FAMILIARIZING HIMSELF WITH SURFACE AND SUB-SURFACE CONDITIONS. THE BASE BID AS SHOWN IN THE PROPOSAL SHALL INCLUDE COSTS FOR UNCLASSIFIED EXCAVATING OF EARTH AND ROCK, FOR DE-WATERING AND STABILIZING UNSUITABLE SOILS SUCH AS

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The City of
SHAWNEE
Public Works Department

R 4 E
SNIDER ROAD

T 11 N

NORTH HARRISON AVENUE

NORTH BRYAN AVENUE

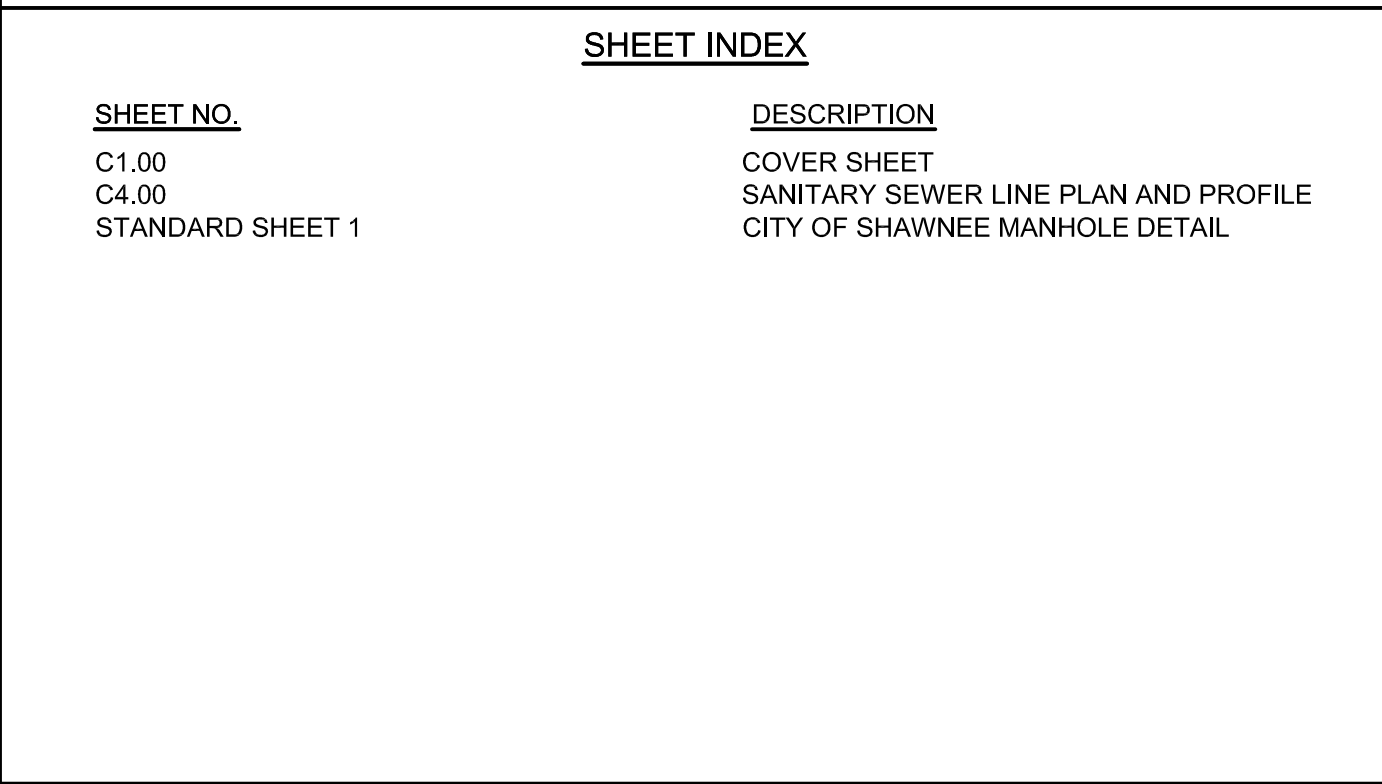
EAST 45th STREET

PROJECT LOCATION

32

LOCATION MAP

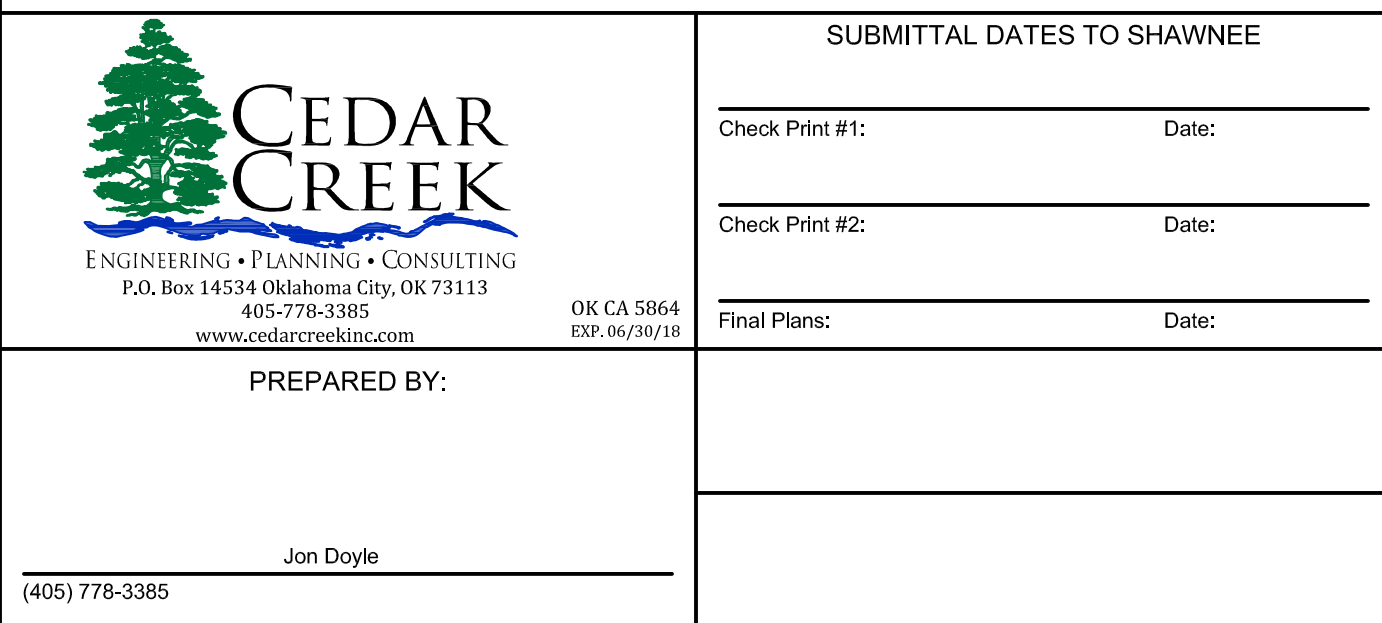
SCALE: 1" = 2000'



PROJECT OWNER/DEVELOPER

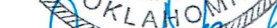
ONE CALL UTILITY LOCATION NUMBER	
840-5032 1-800-522-6543	This number is to be used for information on the location of all underground utilities. Contact this number and other numbers specified in the plans prior to any excavation.

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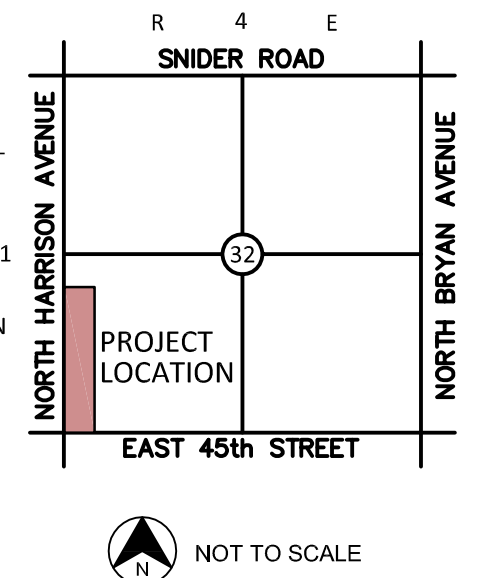
REGISTERED PROFESSIONAL ENGINEER	
DATE: 12.31.2017	

	Field Checked by:	Date:
	Checked by:	Date:
	Checked by:	Date:
	Checked by:	Date:
	Checked by:	Date:
	Checked by:	Date:

	APPROVED: City Engineer: _____ Date: _____
SANITARY SEWER PLANS TO SERVE DOMINO PLAZA	

L5 Construction
7725 W Reno Ave #398,
Oklahoma City, OK 73127

LOCATION MAP:



PROJECT:
**DOMINO PLAZA
45TH &
HARRISON**

SHAWNEE, OKLAHOMA

PROJECT NUMBER: 15085
DRAWING DATE: 04.14.17
ISSUE DATE: 04.14.17

SEAL:



SUBMITTAL:

REVIEW SET

REVISIONS:

MARK	DATE	DESCRIPTION

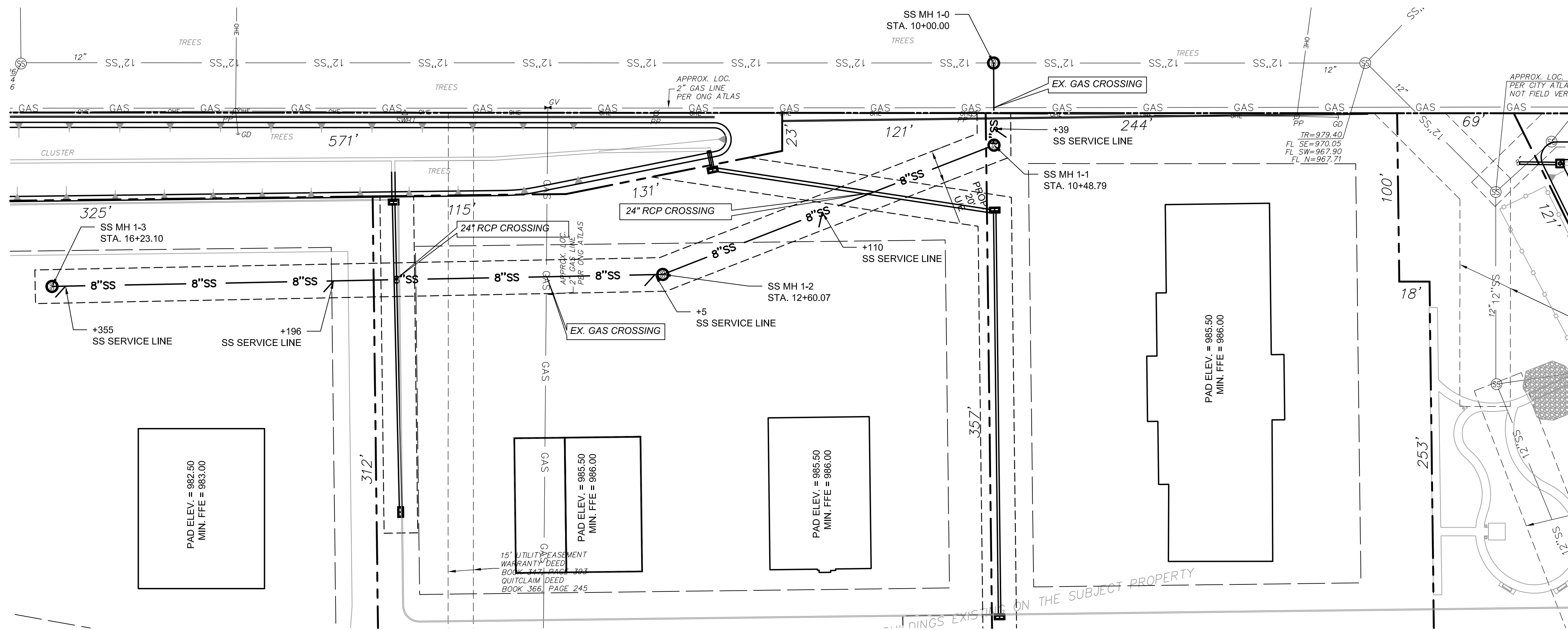
THESE PLANS AND DRAWINGS ARE NOT TO BE REPRODUCED, CHANGED OR COPIED IN ANY FORM OR MANNER, WHATSOEVER, WITHOUT FIRST OBTAINING THE WRITTEN PERMISSION AND CONSENT OF CEDAR CREEK CONSULTING INC. THIS SHEET IS NOT TO BE USED FOR CONSTRUCTION UNLESS THE ISSUE DATE IN THE TITLE BLOCK COINCIDES WITH OR POST DATES THE DRAWING DATE. ANY CHANGES MADE FROM THESE PLANS WITHOUT CONSENT OF CEDAR CREEK CONSULTING INC. ARE UNAUTHORIZED, AND SHALL RELIEVE CEDAR CREEK CONSULTING OF RESPONSIBILITY FOR ALL CONSEQUENCES ARISING OUT OF SUCH CHANGES.

DRAWING TITLE:

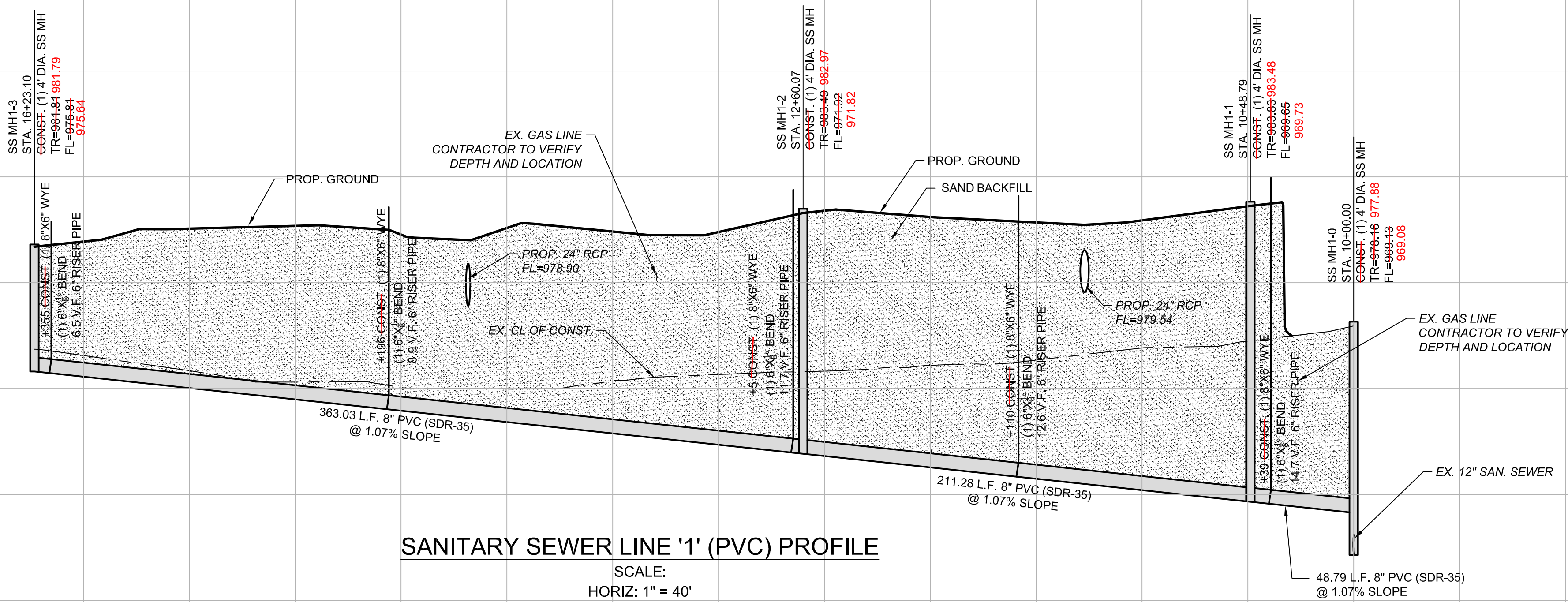
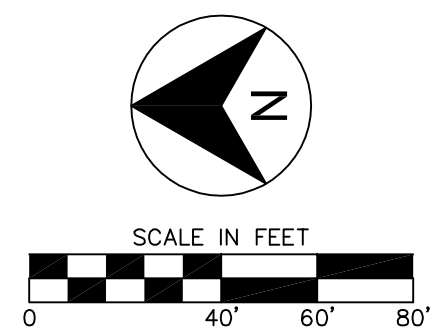
**SANITARY
SEWER
PLAN &
PROFILE**

SHEET:

C4.00



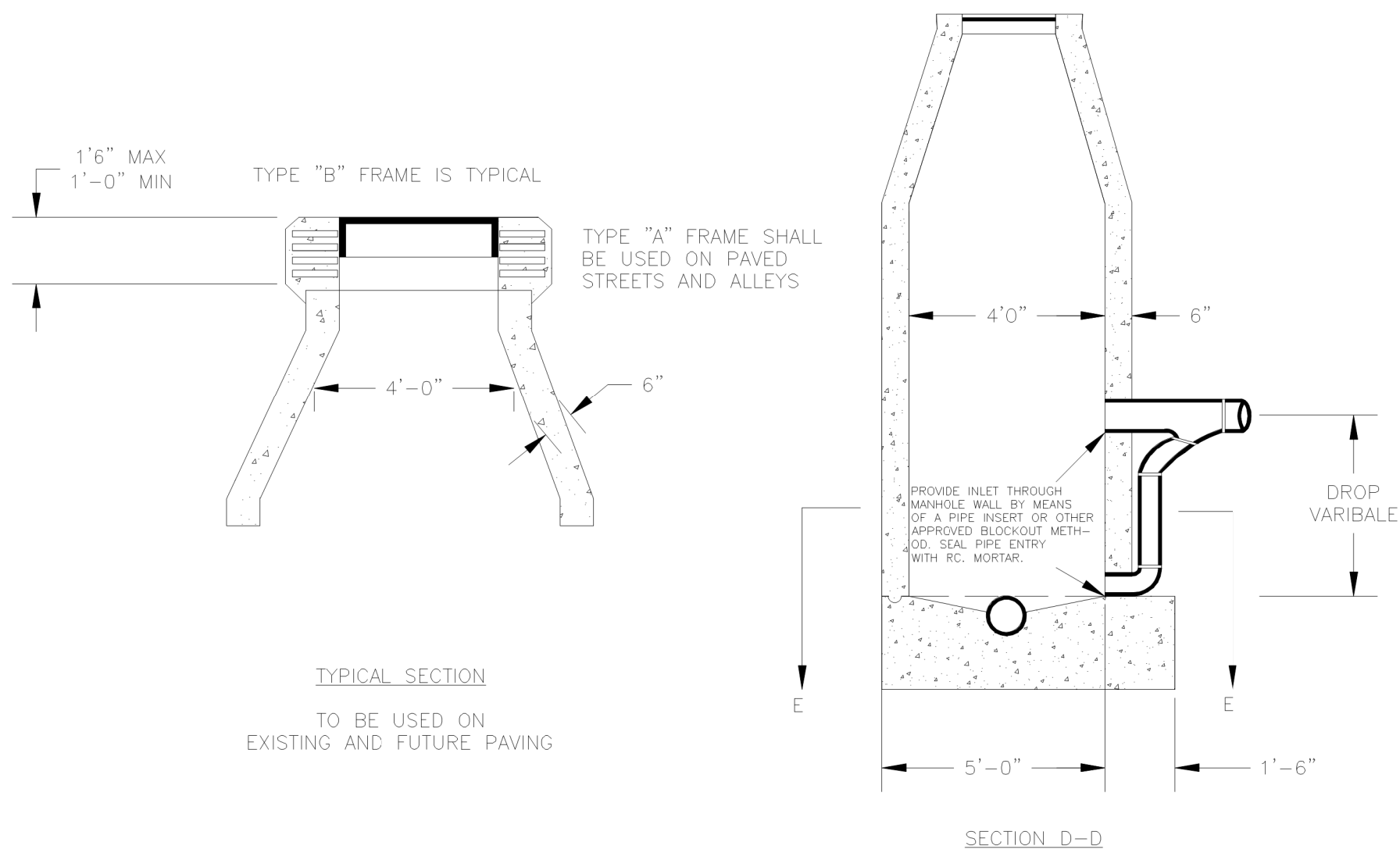
SANITARY SEWER LINE '1' PLAN
SCALE: 1" = 40'



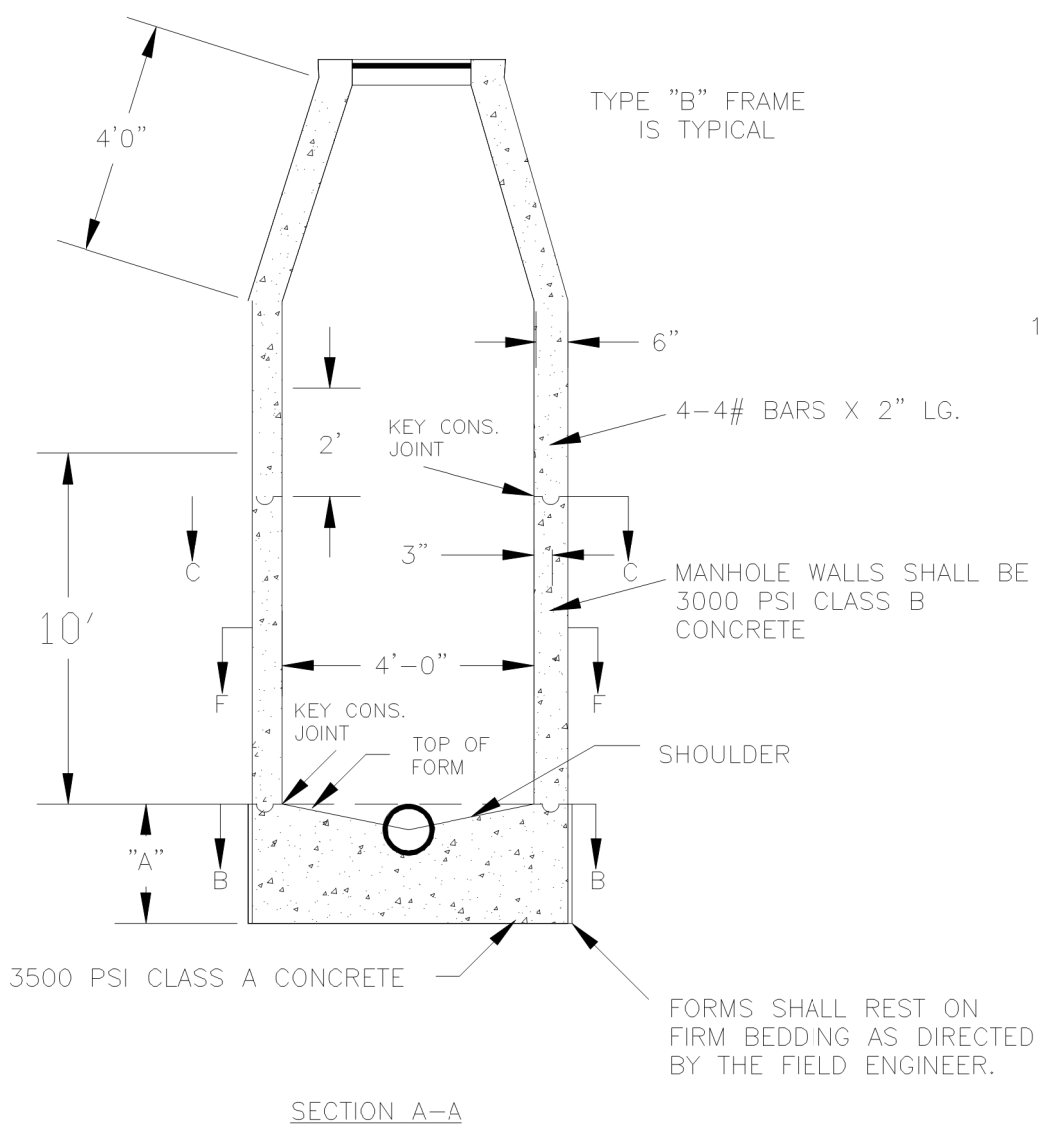
SANITARY SEWER LINE '1' (PVC) PROFILE
SCALE:
HORIZ: 1" = 40'
VERT: 1" = 4'

As-Built 4/29/19

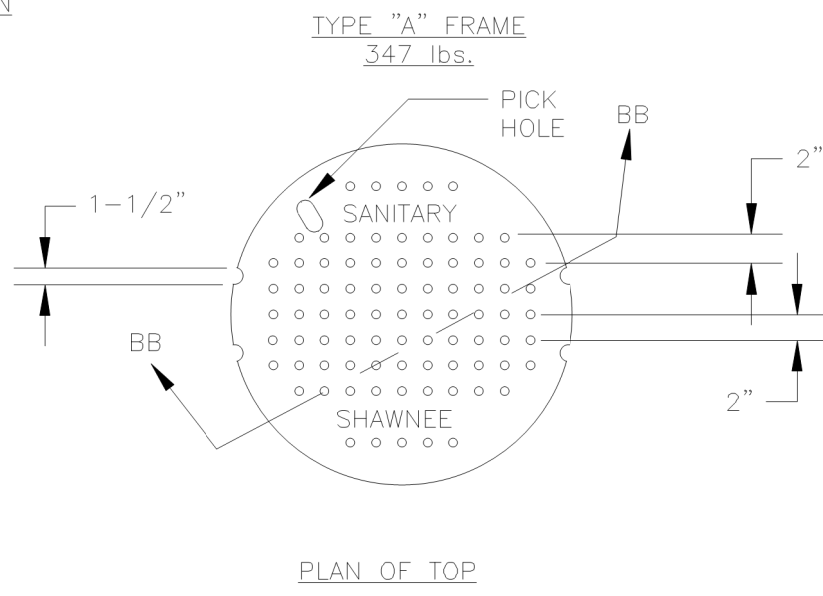
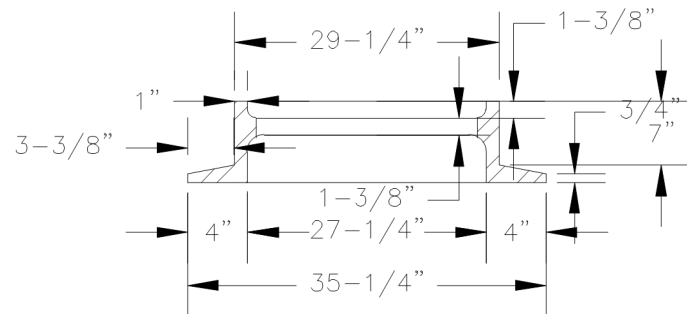
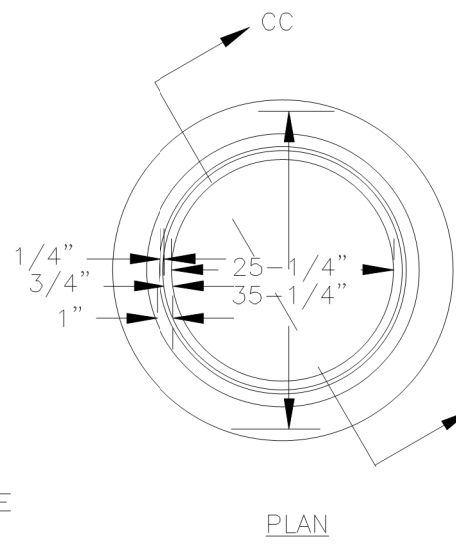
STANDARD
POURED-IN-PLACE DROP MANHOLE



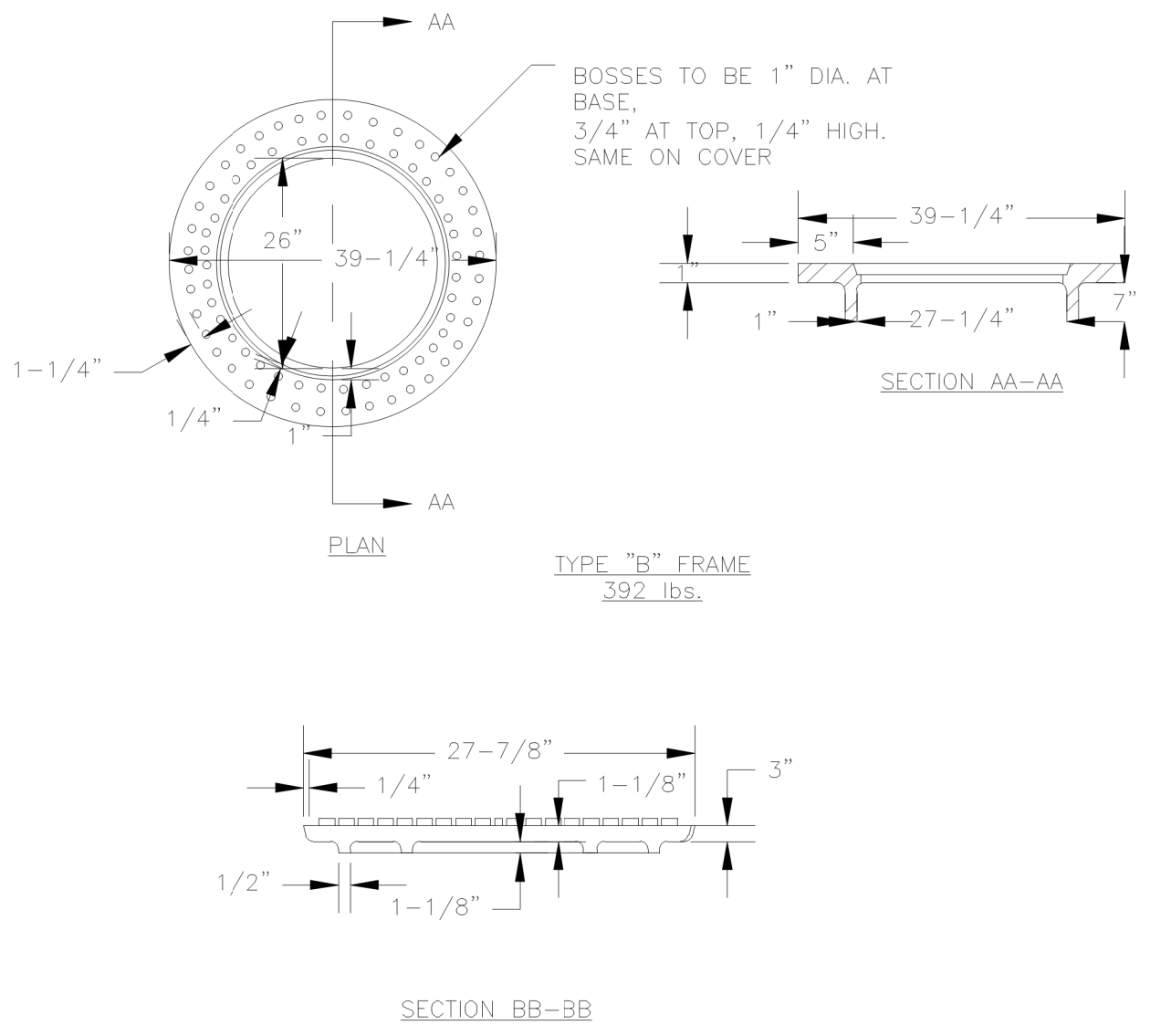
STANDARD
POURED-IN-PLACE MANHOLE



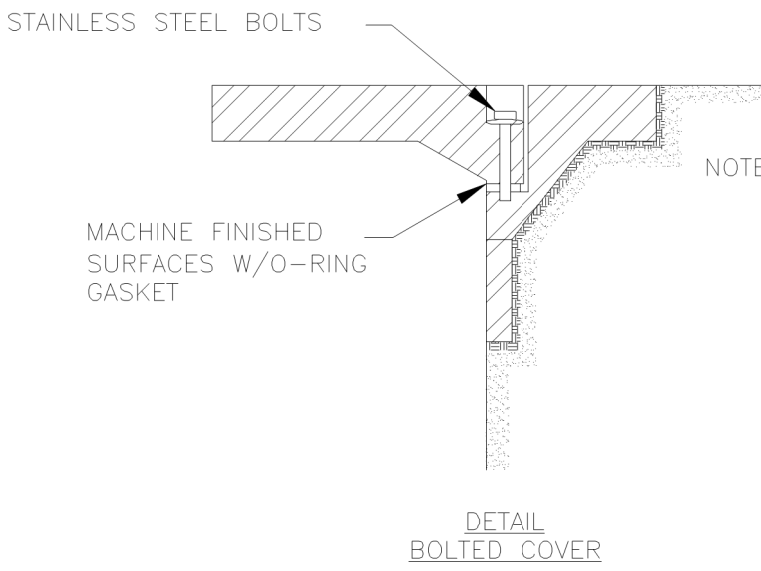
SCHEDULE OF THICKNESS	
PIPE DIA.	DIM. "A"
8"	1'6"
10"	1'8"
12"	1'11"
15"	2'2"
18"	2'6"
21"	2'10"
24"	3'1"



MANHOLE FRAME



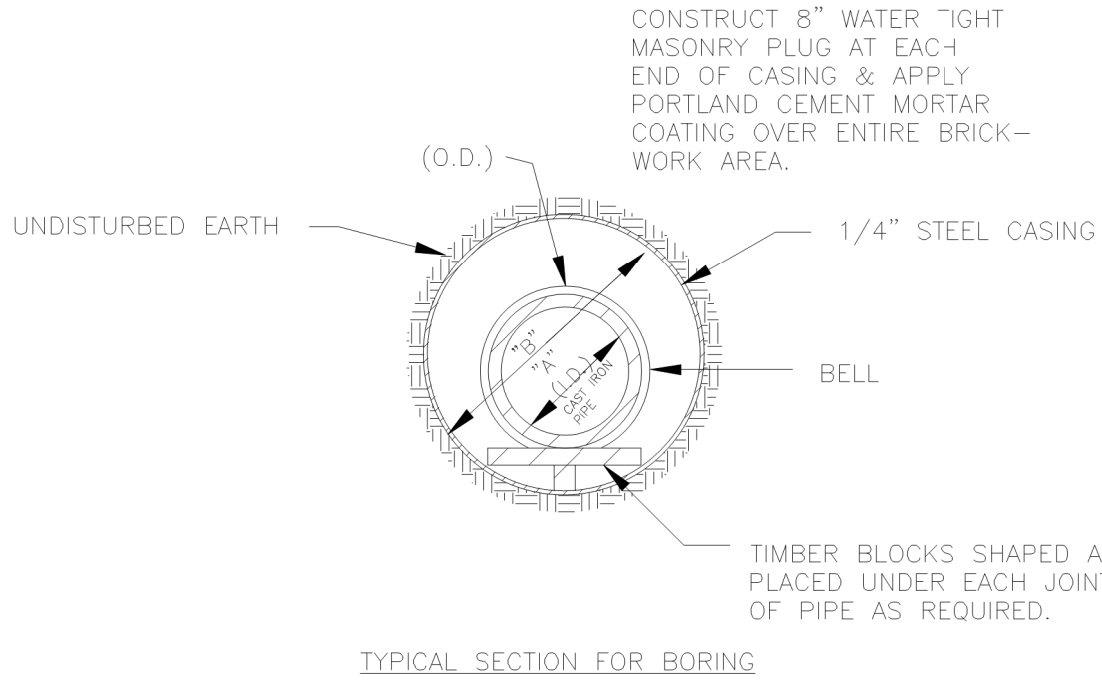
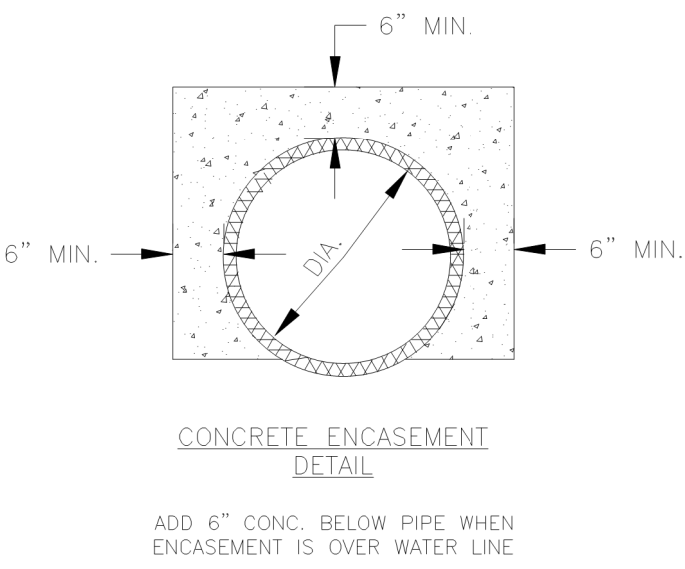
MANHOLE COVER
(FITS FRAMES "A" & "B")
251 lbs.



GENERAL NOTES:

1. THIS MANHOLE IS STANDARD ONLY FOR SEWERS 36" IN DIAMETER OR LESS PROVIDED THAT AT JUNCTION POINTS, SPECIAL MANHOLES MAY BE REQUIRED FOR SEWERS SMALLER THAN 36" IN DIAMETER.
2. INTERIOR SURFACES OF ALL MANHOLE WALLS SHALL RECEIVE TWO COATS OF BLACK SEWER PIPE TYPE PAINT; A MIN. INTERVAL OF 24 HRS. SHALL ELAPSE BETWEEN COATS.
3. FORMS SHALL BE PROVIDED FOR THE SHAPING AND FINISHING OF THE MANHOLE BOTTOM. A MIN. INTERVAL OF 24 HRS. SHALL ELAPSE PRIOR TO POURING OF MANHOLE WALLS.
4. MORTAR FOR FINISHING AND SEALING SHALL BE CLASS "C." ANY HONEY-COMBING OF CONCRETE LESS THAN 2" DEEP IN 6" MANHOLE WALLS MAY BE REPAIRED USING CLASS "D" MORTAR.
5. CONCRETE POURS (ACTUAL VERTICAL DROP OF CONCRETE) FOR HEIGHT OF MANHOLE WALLS SHALL NOT EXCEED 10'. AT THIS INTERVAL A CONSTRUCTION JOINT WILL BE REQUIRED WHEN PLACING THIS MIX.
6. MONOLITHIC POURS OF THE MANHOLE BOTTOM AND WALLS SHALL BE PERMITTED PROVIDED THAT ALL CONCRETE (BOTTOM & WALLS) IS VIBRATED ACCORDING TO THE SPECIFICATIONS FOR THE CONSTRUCTION OF SANITARY SEWERS AND APPURTENANCES.
7. THE FOLLOWING ALTERNATE CONCRETE MIX WILL BE PERMITTED:
MIX DESIGN 3,000 lb. PUMP MIX, 1,460 lb. OF ROCK, 1,700 lb. OF SAND, 5-1/2 BAGS OF CEMENT OR 517 lbs., AND SUFFICIENT WATER TO PRODUCE A 4" SLUMP. NO VIBRATION IS REQUIRED WHEN PLACING THIS MIX.

CONCRETE ENCASEMENT DETAIL	
PIPE SIZE	CU. YD. CONC. PER L.F. ENCASEMENT
8"	0.063
10"	0.075
12"	0.0875
15"	0.106
18"	0.127
21"	0.150
24"	0.175
27"	0.197
30"	0.221
33"	0.246
36"	0.271



PIPE & STEEL CASING SCHEDULE	
PIPE DIAMETER "A"	CASING DIAMETER "B"
8"	14"
10"	18"
12"	20"
16"	24"
18"	26"
20"	30"
24"	33"

As-Built 4/29/19

MANHOLE DETAIL

SURVEY BY: —
DRAWN BY: B.H.
CHECKED BY: J.B.B.

REVISIONS

NO.	DATE	AS-BUILT	DATE

ENGINEER

J.K.

DATE

—

SCALE

AS SHOWN

PROJECT NO.

—

SHEET NO.

XX OF XX

CITY OF SHAWNEE
222 BROADWAY
SHAWNEE, OKLAHOMA

ENGINEERING DEPARTMENT

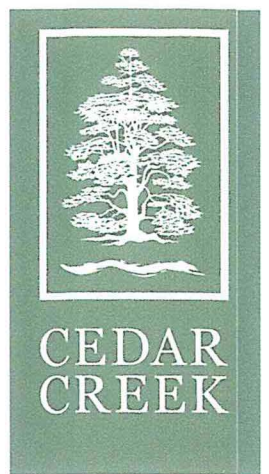


Transmittal

Date: August 2, 2019

Project: Domino Plaza Second Addition

Subject: Amended Final Plat



To: City of Shawnee/ Joseph Barker

We hereby transmit for your:

☐ Approval

☒ Review

☐ Use

The following:

☐ Forms

☒ Report

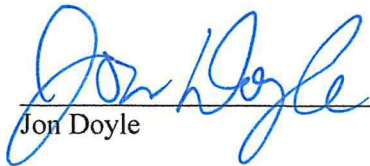
☐ Specifications

☒ Plans

Other

Quantity	Description	No. of Pages
12	Final plat	

Comments:


Jon Doyle

THANK YOU FOR YOUR BUSINESS

FINAL PLAT APPLICATION



City of Shawnee Planning Department

222 N. Broadway
Shawnee, OK 74801
(405) 878-1616 Fax (405) 878-1587
www.ShawneeOK.org

For Office Use Only	
Case Number:	<u>507-19</u>
Project Number:	<u>1904-13</u>
Date Filed:	<u>5-9-2019</u>
Amount Paid:	<u>231.00</u>
Receipt No.:	<u>02291752</u>

Please provide a submittal letter, 6-24 X 36 maps, 1-8 1/2 x 14 map, 1 electronic map and filing fees upon submitting this application. Please call 878-1616 with any questions.

APPLICANT Shawnee Harrison LLC
APPLICANT ADDRESS 1715 South Hwy 183, Clinton, OK 73601
APPLICANT PHONE NUMBERS 580-331-3711
EMAIL ADDRESS msmith@elmersmithoil.com
NAME OF PLAT Domino Plaza Addition Section 1
LOCATION 45th & Harrison
NUMBER OF ACRES 7.74 NUMBER OF LOTS 2

FOR 2 ACRE LOTS OR GREATER DEVELOPMENTS: FEE: \$225.00
PLUS **\$3.00** PER LOT UP TO FIFTY (50) LOTS NUMBER OF LOTS 2 \$6.00
PLUS **\$1.00** PER LOTS OVER FIFTY (50) LOTS NUMBER OF LOTS _____
TOTAL COST \$231.00

FOR LESS THAN 2 ACRE LOTS: FEE: \$225.00
PLUS **\$2.00** PER LOT UP TO FIFTY (50) LOTS NUMBER OF LOTS _____
PLUS **\$1.00** PER LOTS OVER FIFTY (50) LOTS NUMBER OF LOTS _____
TOTAL COST _____

OWNER/DEVELOPER INFORMATION:

NAME Shawnee Harrison LLC
ADDRESS 1715 South Hwy 183, Clinton, OK 73601
CONTACT NUMBERS 580-331-3711
EMAIL ADDRESS msmith@elmersmithoil.com

PROJECT ENGINEER INFORMATION:

NAME Cedar Creek Engineering (Jon Doyle)
ADDRESS PO Box 14534, Okc, Ok 73113
CONTACT NUMBERS 405-778-3385
EMAIL ADDRESS jdoyle@cedarcreekinc.com

APPLICATION, SITE PLAN, CONSTRUCTION DOCUMENTS, PAYMENT, ETC... MUST BE RECEIVED 30 DAYS PRIOR TO MEETING

City of Shawnee OK
405-878-1616

RECH#: 02291752 5/09/2019 11:16 AM
OPER: KG TERM: 020
REF#: 2453
PAID BY:

TRAN: 401.0000 BUILDING PERMIT
190413 231.00CR
SHAWNEE HARRISON LLC
NONE
X-PLATFIN 231.00CR

TENDERED: 231.00 CHECK
APPLIED: 231.00-

CHANGE: 0.00

Visit www.ShawneeOK.org
For More Information

From: [Joseph A. Barker](#)
To: [Rebecca Blaine](#)
Subject: S07-19 - Staff Report
Date: Wednesday, August 21, 2019 10:33:00 AM
Attachments: [Staff Report - S07-19.docx](#)
[image001.png](#)

Rebecca,

Here is the staff report for Item S07-19. Michael told me earlier this morning that he had Ryan review the sanitary sewer as-built mylar submitted for Domino Plaza, Section 2. Engineering has approved of the Final Plat.

Joseph Barker

Assistant City Planner

[222 N. Broadway](#)

[Shawnee, OK 74801](#)

[\(405\) 878 - 1672](#)

Joseph.Barker@shawneeok.org



From: [Alan Blankenship](#)
To: [Joseph A. Barker](#)
Cc: [Rebecca Blaine](#)
Subject: RE: Domino Plaza Addition, Section 2 Amended Final Plat
Date: Wednesday, August 14, 2019 6:53:31 AM
Attachments: [image001.png](#)

Morning Joseph,

The Domino Plaza amended plat is approved to move forward by the SMA.

From: Joseph A. Barker
Sent: Thursday, August 8, 2019 8:09 AM
To: Alan Blankenship <Alan.Blankenship@shawneeok.org>; Andy Starkey <AStarkey@shawneeok.org>; Brittney Burton <brittney.burton@shawneeok.org>; David Anderson <DAnderson@shawneeok.org>; James Kriwanek <Jkriwanek@shawneeok.org>; Rebecca Blaine <Rebecca.Blaine@shawneeok.org>
Cc: Shalah Black <shalah.black@shawneeok.org>
Subject: Domino Plaza Addition, Section 2 Amended Final Plat

Good morning, everyone,

I have received a digital copy of the most recent revision of the Amended Final Plat of Domino Plaza Addition, Section 2. It is attached to this e-mail.

Joseph Barker

Assistant City Planner
[222 N. Broadway](#)
[Shawnee, OK 74801](#)
[\(405\) 878 - 1672](#)
Joseph.Barker@shawneeok.org



From: [David Anderson](#)
To: [Joseph A. Barker](#)
Subject: RE: Domino Plaza Addition, Section 2 Amended Final Plat
Date: Wednesday, August 14, 2019 4:25:06 PM
Attachments: [image001.png](#)

Joseph,

I'm good with this one also. Thanks.

David

From: Joseph A. Barker <Joseph.Barker@shawneeok.org>
Sent: Thursday, August 8, 2019 8:09 AM
To: Alan Blankenship <Alan.Blankenship@shawneeok.org>; Andy Starkey <AStarkey@shawneeok.org>; Brittney Burton <brittney.burton@shawneeok.org>; David Anderson <DAnderson@shawneeok.org>; James Kriwanek <Jkriwanek@shawneeok.org>; Rebecca Blaine <Rebecca.Blaine@shawneeok.org>
Cc: Shalah Black <shalah.black@shawneeok.org>
Subject: Domino Plaza Addition, Section 2 Amended Final Plat

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I have received a digital copy of the most recent revision of the Amended Final Plat of Domino Plaza Addition, Section 2. It is attached to this e-mail.

Joseph Barker

Assistant City Planner

[222 N. Broadway](#)

[Shawnee, OK 74801](#)

[\(405\) 878 - 1672](#)

Joseph.Barker@shawneeok.org



Regular Board of Commissioners

6.

Meeting Date: 09/16/2019

Preliminary Plat

Submitted By: Kacie Eck, City Clerk

Department: City Clerk

Information

Title of Item for Agenda

Consideration of approval of a preliminary plat for Cardinal Pointe located north of East 45th Street and immediately adjacent to the west side of the A.T.&S.F. Railroad for the purpose of single-family and commercial development. Case No. S02-19, Applicant: Landes Engineering.

Attachments

Preliminary Plat

RECOMMENDATION TO:

MAYOR
BOARD OF CITY COMMISSIONERS
CITY OF SHAWNEE

RECOMMENDATION FROM:

CITY OF SHAWNEE
PLANNING COMMISSION

SUBJECT:

APPLICANT: Landes Engineering
FOR: Preliminary Plat for Cardinal Pointe
LOCATION: North of East 45th Street, west of Railroad
PROJECT# 190262 CASE# S02-19

A tract of land located in the southeast quarter (SE/4) of Section Thirty One (31), Township Eleven North (T11N), Range Four East (R4E) of the Indian Meridian, Shawnee, Pottawatomie County, Oklahoma, with a basis of bearing of N00°54'43"E along the west line of the northwest quarter (NW/4) of said SE/4, and more particularly described as: commencing at the northwest corner (NW/C) of said SE/4; thence S00°54'43"W along the west line of said NW/4-SE/4 a distance of 943.22 feet to the point of beginning; thence S89°05'17"E a distance of 315.00 feet; thence N89°41'33"E a distance of 1131.44 feet to a point on the west property line of the A.T.& S.F. Railway Company right-of-way; thence S02°44'42"E along said right-of-way line a distance of 774.83 feet; thence S89°44'50"W a distance of 166.70 feet to a point on the east line of the southwest quarter (SW/4) of said SE/4; thence S00°06'05"E along said east line a distance of 896.60 feet to a point on the south line of said SW/4-SE/4. Thence S89°30'53"W along said south line a distance of 329.58 feet; thence N00°08'29"W a distance of 528.68 feet; thence S89°30'54"W a distance of 329.95 feet; thence N00°10'54"W a distance of 781.72 feet to a point on the north line of said SW/4-SE/4; thence S89°41'33"W along said north line a distance of 0.98 feet; thence N00°54'43"E a distance of 285.00 feet; thence S89°41'33"W a distance of 660.00 feet to a point on the west line of the northwest quarter (NW/4) of said SE/4; thence N00°54'43"E along said west line a distance of 84.00 feet to the point of beginning, containing 25.16 acres, more or less.

PLANNING COMMISSION MEETING DATE: September 4th, 2019

PLANNING COMMISSION RECOMMENDATION: Approval

VOTE OF THE PLANNING COMMISSION:

MEMBERS PRESENT: 5

MEMBERS:	1ST	2ND	AYE	NAY	ABSTAIN	COMMENTS
DEEM		X	X			
MATTHEWS	X		X			
WALKER			X			
BERGSTEN (CHAIRMAN)						ABSENT
ROWELL						ABSENT
KIENZLE			X			
MELOT			X			

RESPECTFULLY SUBMITTED,

Joseph Barker

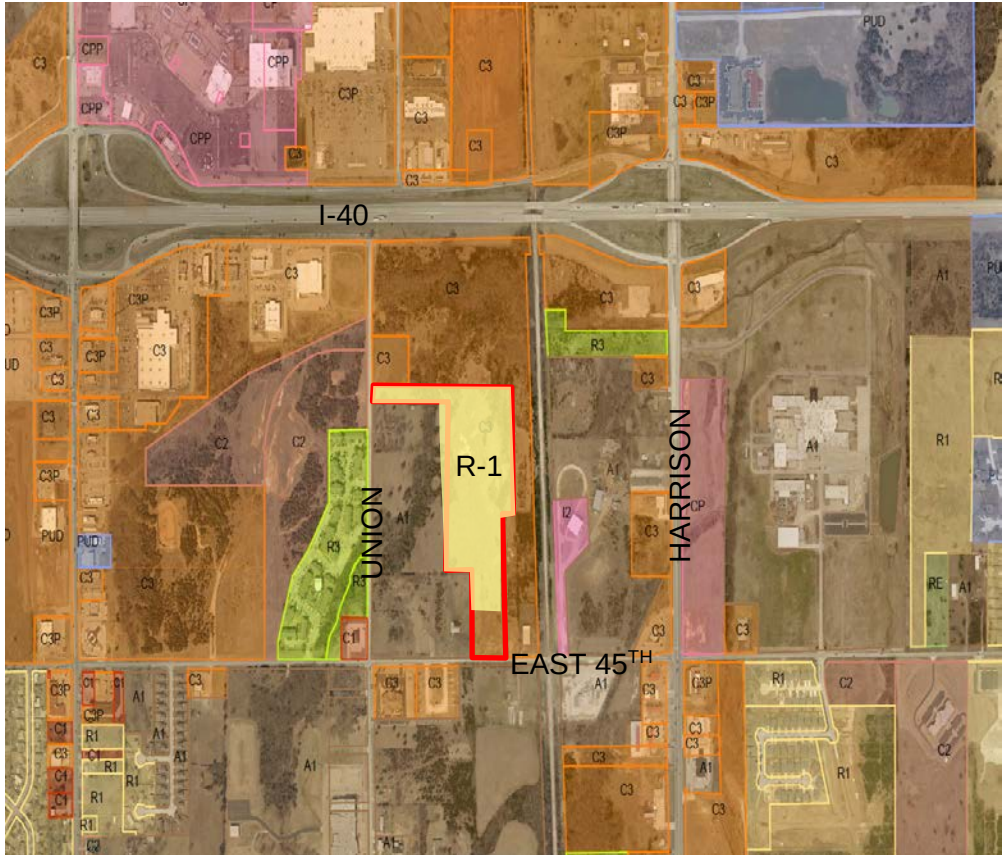
SECRETARY, PLANNING COMMISSION

ACTION BY CITY COMMISSION:

PUBLIC HEARING SET: _____

DATE OF ACTION: _____

ADOPTED _____ DENIED _____

City of Shawnee Planning Department 222. N. Broadway Shawnee, OK 74801 (405) 878-1616 Fax: (405) 878-1587 www.ShawneeOK.org			CASE # S02-19 PUBLIC HEARING DATE: September 4th, 2019 CITY COMMISSION DATE: September 16th, 2019	
APPLICANT: Landes Engineering	903 East 35th Street Shawnee, Oklahoma, 74804		Slandes@landesengineering.net	
PROPERTY ADDRESS/LOCATION: Northeast corner of Union and 45th				
The applicant, Landes Engineering, is requesting preliminary plat approval to divide a 25.16-acre tract of land into 86 lots, 83 of which would be single-family, 2 would be commercial, and 1 would be an outlot for stormwater detention. 23.85 acres of the plat is zoned R-1, and 1.31 acres is zoned C-3. Access would be from East 45th Street. There would be 3.5 dwelling units per acre.				
EXISTING ZONING: R-1 & C-3	EXISTING LAND USE: Vacant	SURROUNDING ZONING & LAND USE: A-1 (Rural Agricultural) C-3 (Highway Commercial)	LOTS: 86	PROPERTY SIZE: 25.16 acres

STAFF RECOMMENDATION

The development is divided into two zones: The roughly south 180 feet of the property will be zoned C-3, while the rest R-1. The R-1 portion of the development is required to abide by the dimensional standards of Table 22-160.4.1, "Density and Dimensional Standards by [Residential] Zone":

- Minimum lot size for each lot is 6,000 square feet – Each proposed lot meets this requirement;
- Minimum lot width for each lot is 60 feet – Each proposed lot meets this requirement;
- Minimum street frontage is 35 feet – Each proposed lot meets this requirement;
- Front yard setbacks are required to be 25 feet (20 feet if a cul de sac lot) – Each proposed lot meets this requirement; and
- Side yard setbacks are required to be 5 feet (15 feet for corner lots) – Each proposed lot meets this requirement.

The lots zoned C-3 are required to abide by the dimensional standards of Table 22-165.4.1, "Density and Dimensional Standards by [Commercial] Zone":

- Minimum lot size for each lot is 10,000 square feet – Each proposed lot meets this requirement;
- Minimum lot width for each lot is 100 feet – Each proposed lot meets this requirement;
- Minimum street frontage is 100 feet – Each proposed lot meets this requirement;
- Front yard setbacks are required to be 25' – Each proposed lot meets this requirement; and
- It should be noted that the side yard setbacks for C-3 lots that abut a residential district is 2' for every 1' of building height.

Preliminary plats are required to abide by the standards of the City of Shawnee Subdivision Regulations. Article VIII, Platting Procedures. Section 2, Preliminary Plat Preparation and Approval Procedure provides a list of documents and information that must be submitted for a preliminary plat to be approved. The submitted plat meets these requirements.

Subsection 2, Certification of Design, requires a preliminary plat to be accompanied by a statement signed by the professional engineer preparing the plat that they have, to the best of their ability, designed the subdivision in accordance with the Comprehensive Plan with which they are completely familiar, and in accordance with the ordinances and regulations governing the subdivision of land. The submitted plat meets this requirement.

Subsection 3, General Requirements, lists basic requirements of a submitted preliminary plat. The submitted plat meets these requirements.

Subsection 4, Contents of Preliminary Plat, provides a list of information required to be shown on any submitted preliminary plat. The submitted plat meets these requirements.

Subsection 5, Statistical Data, lists required statistical data to be provided by the applicant. The submitted plat meets these requirements.

The 2005 Comprehensive Plan designates the future use of this area to be residential and commercial. Thus, the proposed plat aligns with the intentions of the 2005 Comprehensive Plan.

The purpose of the R-1 District is development of single-family dwellings and related recreational, religious, and educational facilities normally required to provide the basic elements of a balanced and attractive residential area. The submitted plat aligns with that purpose. The purpose of the C-3 District is the development of land for establishments

which serve the entire community but do not, and should not necessarily, locate in more restrictive commercial districts. The submitted plat aligns with that purpose.

The Planning Department has received the following feedback from the appropriate agencies:

Engineering/Streets:

No issues.

Shawnee Municipal Authority:

No issues.

Fire Department:

No issues.

The proposed preliminary plat meets all the standards of the City of Shawnee. Staff hereby recommends approval upon the following conditions:

1. Final construction documents must be approved by the City Engineer concurrent with final plat approval;
2. Drainage plans must be approved by the City Engineer concurrent with final plat approval; and
3. All other applicable city standards apply.

APPROVE

APPROVE WITH CONDITIONS

DENY

**ATTACHMENTS:
(CIRCLE)**

SUBMITTED PLANS

**PUBLIC HEARING
PETITION/
APPLICATION FORM**

LEGAL NOTICE

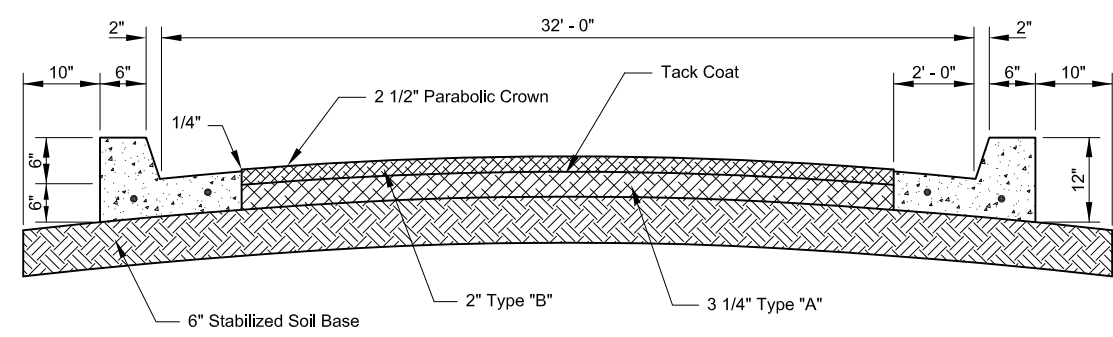
LEGAL DESCRIPTION

PUBLIC COMMENTS

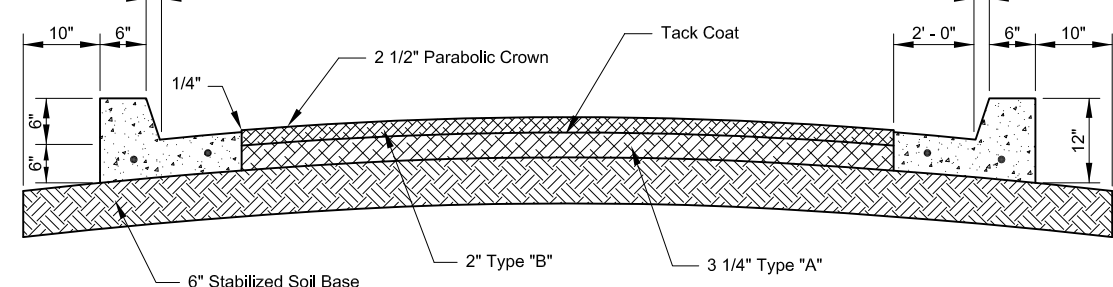
AGENCY COMMENTS

RESPONSE TO STANDARDS

LEGAL DESCRIPTION:
A TRACT OF LAND LOCATED IN THE SOUTHEAST QUARTER (SE/4) OF SECTION TWENTY (31), TOWNSHIP ELEVEN NORTH (11N), RANGE FOUR EAST (R4E) OF THE INDIAN MERIDIAN, SHAWNEE, POTTAWATOMIE COUNTY, OKLAHOMA, WITH A BASIS OF BEARING OF N00°54'43"E ALONG THE WEST LINE OF THE NORTHWEST QUARTER (NW/4) OF SAID SE/4, AND MORE PARTICULARLY DESCRIBED AS:
COMMENCING AT THE NORTHWEST CORNER (NW/C) OF SAID SE/4; THENCE S00°54'43"W ALONG THE WEST LINE OF SAID NW/4-SE/4 A DISTANCE OF 943.22 FEET TO THE POINT OF BEGINNING; THENCE S89°05'17"E A DISTANCE OF 315.00 FEET; THENCE N89°41'33"E A DISTANCE OF 1131.44 FEET TO A POINT ON THE WEST PROPERTY LINE OF THE A.T.&S.F. RAILWAY COMPANY RIGHT-OF-WAY; THENCE S02°44'42"E ALONG SAID RIGHT-OF-WAY LINE A DISTANCE OF 774.83 FEET; THENCE S89°44'50"W A DISTANCE OF 166.70 FEET TO A POINT ON THE EAST LINE OF THE SOUTHWEST QUARTER (SW/4) OF SAID SE/4; THENCE S00°06'05"E ALONG SAID EAST LINE A DISTANCE OF 696.60 FEET TO A POINT ON THE SOUTH LINE OF SAID SW/4-SE/4; THENCE S89°30'53"W ALONG SAID SOUTH LINE A DISTANCE OF 528.58 FEET; THENCE N00°08'29"W A DISTANCE OF 528.68 FEET; THENCE S89°30'54"W A DISTANCE OF 329.95 FEET; THENCE N00°10'54"W A DISTANCE OF 781.72 FEET TO A POINT ON THE NORTH LINE OF SAID SW/4-SE/4; THENCE S89°41'33"W ALONG SAID NORTH LINE A DISTANCE OF 0.98 FEET; THENCE N00°54'43"E A DISTANCE OF 285.00 FEET; THENCE S89°41'33"W A DISTANCE OF 660.00 FEET TO A POINT ON THE WEST LINE OF THE NORTHWEST QUARTER (NW/4) OF SAID SE/4; THENCE N00°54'43"E ALONG SAID WEST LINE A DISTANCE OF 84.00 FEET TO THE POINT OF BEGINNING, CONTAINING 25.16 ACRES, MORE OR LESS.



TYPICAL SECTION
32' (COLLECTOR) ASPHALTIC CONCRETE PAVING



TYPICAL SECTION
26' (LOCAL) ASPHALTIC CONCRETE PAVING

DEVELOPERS INFORMATION

CURRENTLY ZONED: LOT 1, BLOCK 1 AND LOT 32, BLOCK 1 CURRENTLY ZONED C-3.
REMAINDER OF PROPERTY IS CURRENTLY ZONED AS R-1.

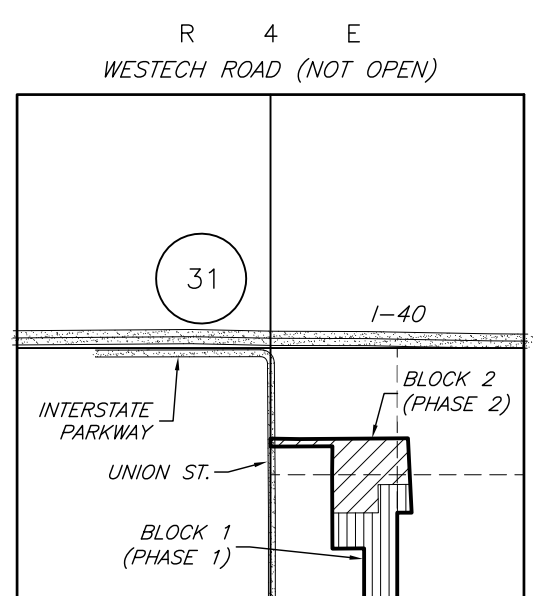
LOCATION: NE CORNER, UNION & 45TH STREET
SHAWNEE, OK. 74804

OWNER & DEVELOPER: CARDINAL POINT DEVELOPMENT, LLC
BRYAN LITTLE, PRINCIPAL
RICK LANDES, PRINCIPAL
P.O. BOX 3503
SHAWNEE, OK. 74802

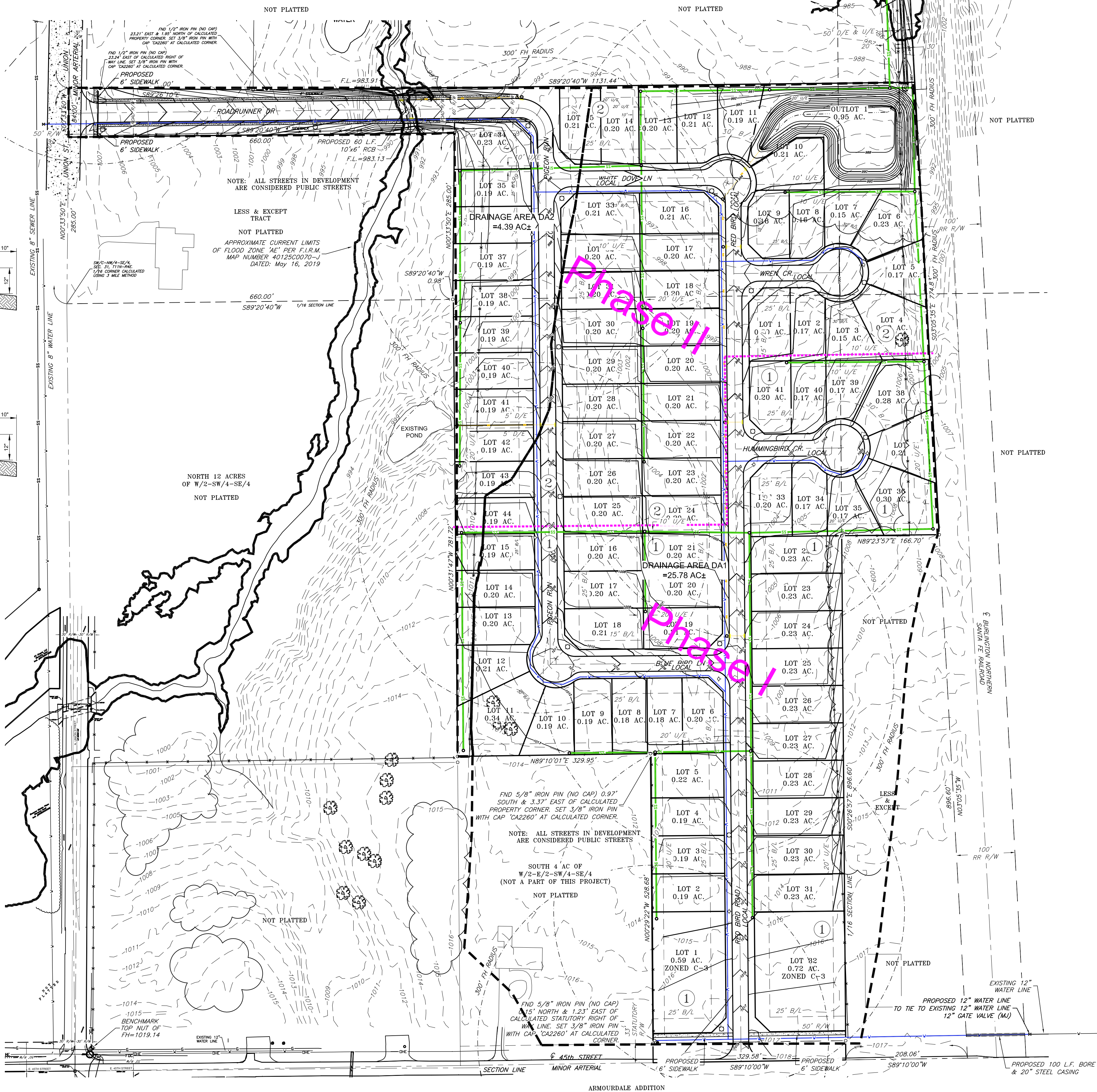
PROJECT ENGINEER: STEPHEN T. LANDES
903 E. 35TH ST.
SHAWNEE, OK. 74804
(405) 275-5388

BENCHMARK

BENCHMARK #1 TOP NUT FH
NE CORNER 45TH & UNION
TOP NUT=1019.14

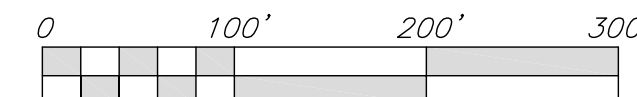
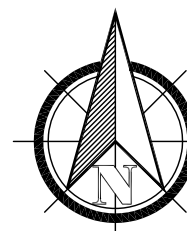


LOCATION MAP
SCALE: 1" = 2000'



PRELIMINARY PLAT CARDINAL POINT

A SUBDIVISION OF A PART OF THE SOUTHEAST QUARTER (SE/4)
OF SECTION 31, TOWNSHIP 11 NORTH, RANGE 4 EAST OF THE
INDIAN MERIDIAN, POTTAWATOMIE COUNTY, OKLAHOMA



SCALE: 1" = 100'

LEGEND

- (o) INDICATES 3/8" IRON PIN SET, W/CAP "CA 2260" (UNLESS OTHERWISE NOTED)
- (•) INDICATES EXISTING MONUMENT
- WATER METER
- WATER VALVE
- FIRE HYDRANT
- POWER POLE
- STREET LIGHT
- GUY WIRE
- GAS METER
- VENT PIPE
- TELEPHONE PEDESTAL
- ELECTRIC BOX
- CLEAN OUT
- MANHOLE
- STORM DRAIN
- AIR CONDITIONER UNIT
- SIGN
- BENCHMARK
- TREE
- TUG- TELEPHONE, UNDERGROUND
- USE- UNDERGROUND ELECTRIC
- OHE- OVERHEAD ELECTRIC & CABLE TV
- FOC- FIBER OPTIC CABLE
- CATV- CABLE TV
- PET- PETROLEUM LINE
- C- GAS LINE
- HPG- HIGH PRESSURE GAS LINE
- W- WATER LINE
- SS- SANITARY SEWER LINE
- STS- STORM SEWER
- PSS- PRESSURIZED SANITARY SEWER LINE
- X- FENCE
- FLOW LINE

STATISTICAL DATA

- A. 25.16 TOTAL ACRES
- B. 86 TOTAL LOTS
- 41 LOTS IN BLOCK 1 (PHASE 1)
- 44 LOTS IN BLOCK 2 (PHASE 2)
- 1 OUTLOT (STORMWATER DETENTION AREA)
- C. 83 SINGLE FAMILY DWELLING UNITS
- 23.85 ACRES ZONED R-1
- RESIDENTIAL DENSITY = 1.5 UNITS PER ACRE
- D. 2 COMMERCIAL LOTS, TOTALING 1.31 ACRES
- E. NONE
- F. NONE
- G. 765 L.F. COLLECTOR STREETS
- 1468 L.F. LOCAL STREETS
- H. 0.95 ACRE OUTLOT

STORMWATER FLOW

THE PROPERTY IS TO BE GRADED AND STORMWATER RUNOFF IS TO BE DIRECTED TOWARDS THE PROPOSED DRY STORMWATER DETENTION AREA LOCATED IN THE NORTHEAST CORNER OF THE PROPERTY. THE STORMWATER IS TO BE DETAINED IN THE PROPOSED DETENTION AREA AND DISCHARGED INTO TRIBUTARY #1 TO TRIBUTARY #2 TO ROCK CREEK.

FLOOD STATEMENT

THIS PROPERTY IS PARTIALLY LOCATED IN FLOOD ZONE "AE" PER F.I.R.M. POTTAWATOMIE COUNTY, OKLAHOMA AND INCORPORATED AREAS, PANEL 70 OF 550, MAP NUMBER 40125C0070-J, MAP REVISED 5-16-2019.

UNDERGROUND UTILITIES NOTES

SOURCE INFORMATION FROM PLANS AND MARKINGS HAVE BEEN COMBINED WITH OBSERVED EVIDENCE OF UTILITIES TO DEVELOP A VIEW OF THOSE UNDERGROUND UTILITIES. HOWEVER, LACKING EXCAVATION, THE EXACT LOCATION OF UNDERGROUND FEATURES CANNOT BE ACCURATELY, COMPLETELY AND RELIABLY DEPICTED. WHERE ADDITIONAL OR MORE DETAILED INFORMATION IS REQUIRED, THE CLIENT IS ADVISED THAT EXCAVATION MAY BE NECESSARY.

PRELIMINARY PLAT NOTE

THE PRELIMINARY PLAT HAS BEEN PREPARED TO THE BEST OF OUR ABILITIES IN ACCORDANCE WITH THE COMPREHENSIVE PLAN WITH WHICH WE ARE FAMILIAR, AND IN ACCORDANCE WITH THE ORDINANCES AND REGULATIONS GOVERNING THE SUBDIVISION OF LAND EXCEPT WHERE VARIANCES ARE BEING REQUESTED.

BASIS OF BEARING

BASIS OF BEARING OF S89°10'00"W ALONG THE SOUTH LINE OF THE SE/4 OF SECTION 31, T11N-R4E, I.M. BASED ON OKLAHOMA SOUTH STATE PLANE COORDINATE SYSTEM.

DWG FILE: P:\ENGINEERING\2019\UNION\CARDINAL SOUTH.DWG

Cardinal Point Development, LLC

Cardinal Point

Preliminary Plat

Design: STL Date: 03/05/2019

Drawn: STL

Sheet: 1 of 7

LANDES ENGINEERING L.L.C.

www.landesengineering.net

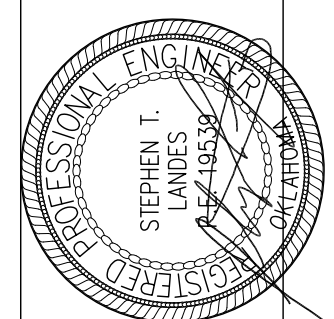
903 E. 35th Street * P.O. BOX 1032

Shawnee, OK 74802-1032

(405) 275-5388 * Fax (405) 275-9047

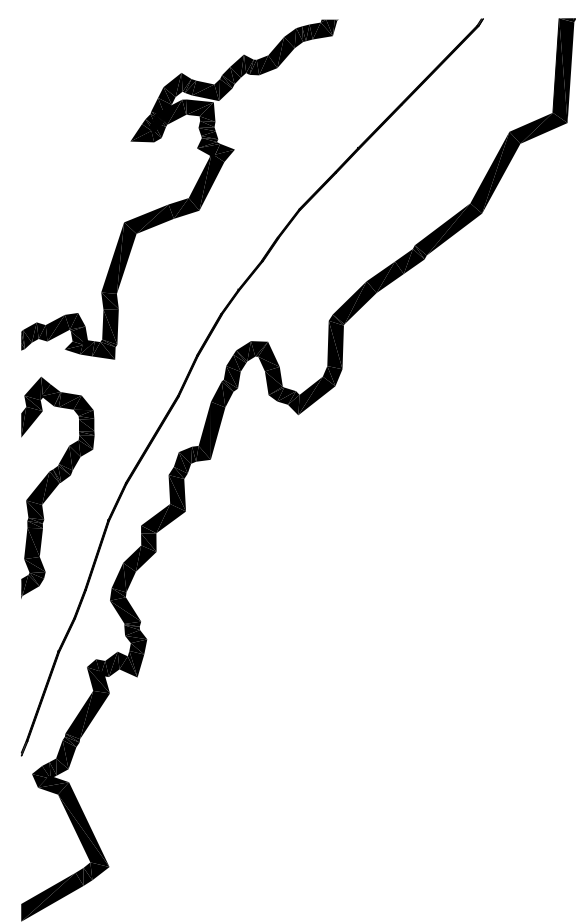
CA # 2260 EXP. 6-30-21

Date



Revisions

No.	Date	Revised By	Revised For
1	04/11/2019	MARK-UPS PER CITY REVIEW	
2	07/12/2019	MARK-UPS PER CITY REVIEW	
3	08/01/2019	MARK-UPS PER CITY REVIEW	
4	08/22/2019	MARK-UPS PER CITY REVIEW	



SCALE: 1" = 50'



NOTE: ALL STREETS IN DEVELOPMENT ARE CONSIDERED PUBLIC STREETS

SOUTH 4 AC OF
W/2-E/2-SW/4-SE/4
(NOT A PART OF THIS PROJECT)
NOT PLATTED

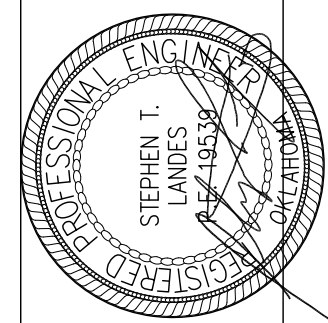
NOT PLATTED

LESS
&
EXCEPT

NOT PLATTED

BURLINGTON NORTHERN
SANTA FE RAILROAD

EXISTING 12" WATER LINE



LANDES ENGINEERING L.L.C.

www.landesengineering.net
903 E. 35th Street * P.O. BOX 1032
Shawnee, OK 74802-1032
(405) 275-5388 * Fax (405) 275-9047
CA # 2260 EXP. 6-30-21

Cardinal Point Development, LLC

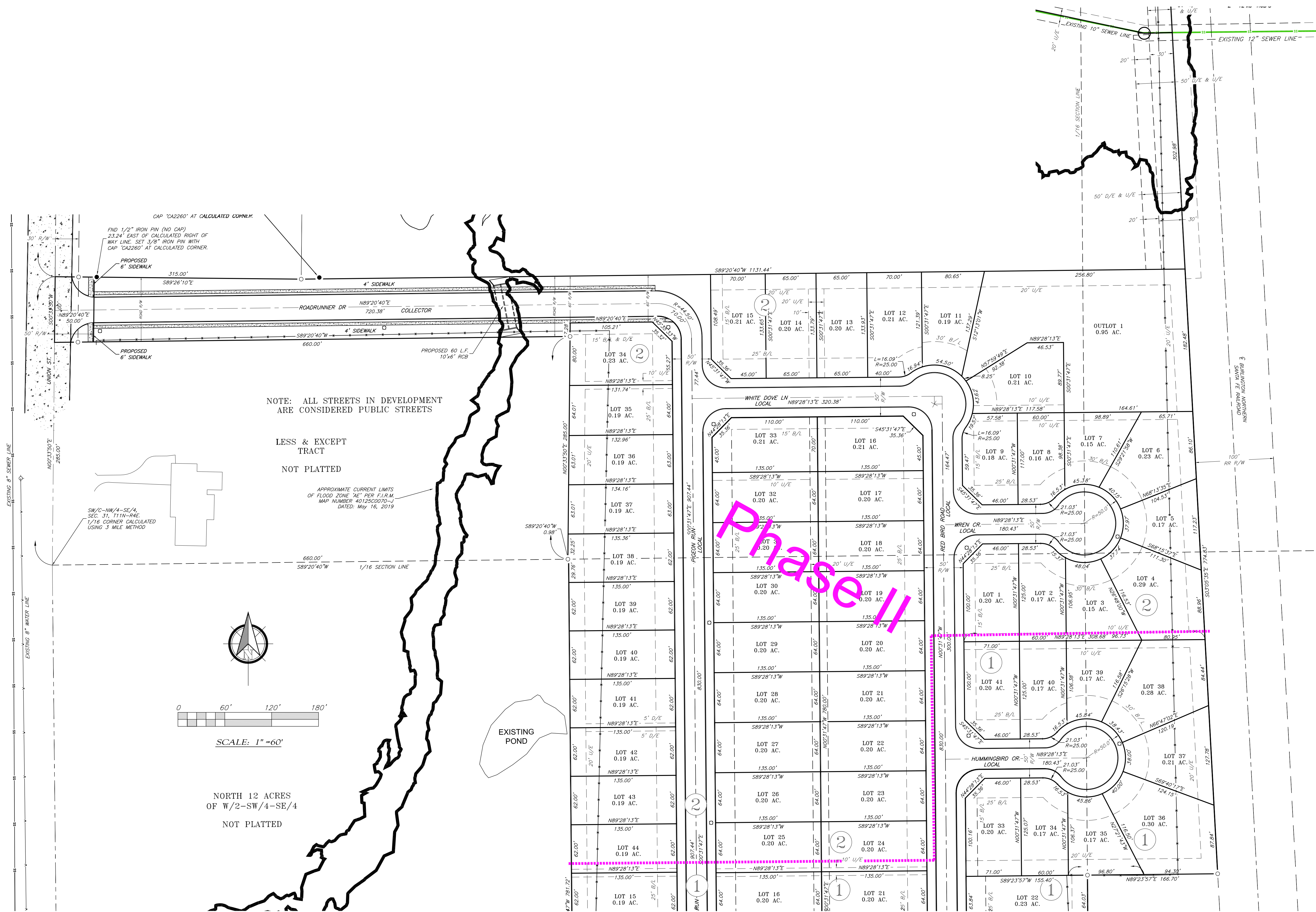
Cardinal Point

Preliminary Plat

Design: STL
Drawn: ml
Check: STL
Date: 03/05/2019
Sheet: 2 of 7

Revisions

No.	Date	Desc
1	04/11/2019	MARK-UPS PER CITY REVIEW
2	07/12/2019	MARK-UPS PER CITY REVIEW
3	08/01/2019	MARK-UPS PER CITY REVIEW
4	08/22/2019	MARK-UPS PER CITY REVIEW

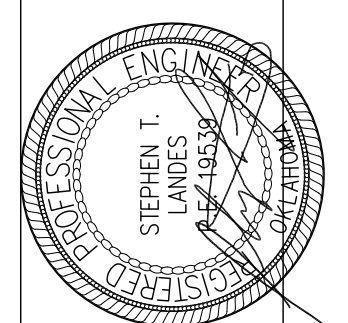
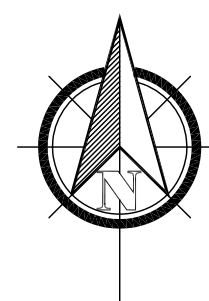


NOTE: ALL STREETS IN DEVELOPMENT
ARE CONSIDERED PUBLIC STREETS

LESS & EXCEPT
TRACT
NOT PLATTED

NORTH 12 ACRES
OF W/2-SW/4-SE/4
NOT PLATTED

SCALE: 1"=60'



LANDES ENGINEERING L.L.C.

www.landesengineering.net
903 E. 35th Street * P.O. BOX 1032
Shawnee, OK 74802-1032
(405) 275-5388 * Fax (405) 275-9047
CA # 2260 EXP. 6-30-21

Cardinal Point Development, LLC

Cardinal Point

Preliminary Plat

No.	Date	Revisions
1	04/11/2019	MARK-UPS PER CITY REVIEW
2	07/12/2019	MARK-UPS PER CITY REVIEW
3	08/01/2019	MARK-UPS PER CITY REVIEW
4	08/22/2019	MARK-UPS PER CITY REVIEW

Date

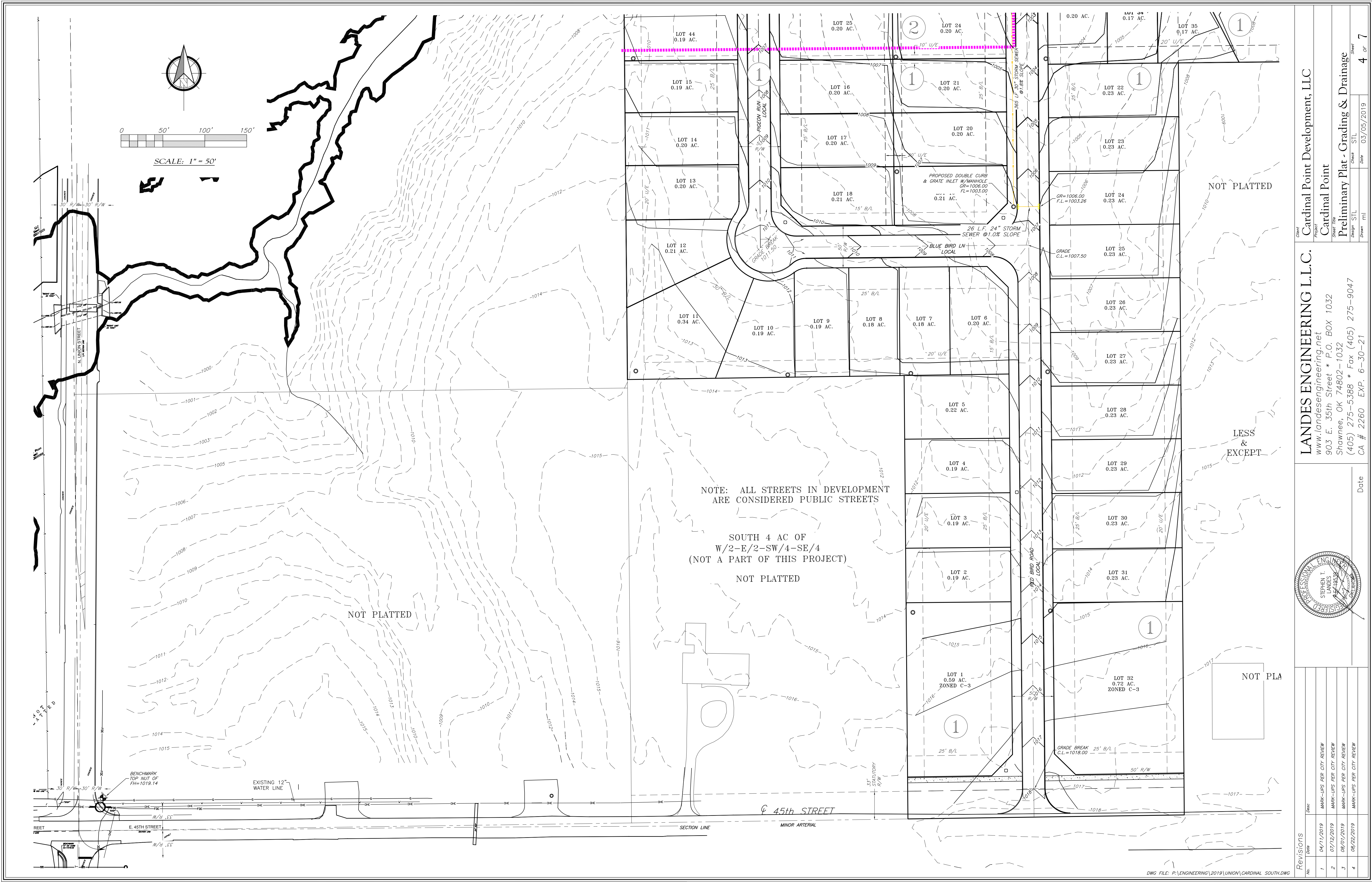
Check

STL

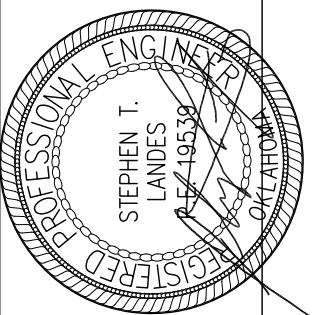
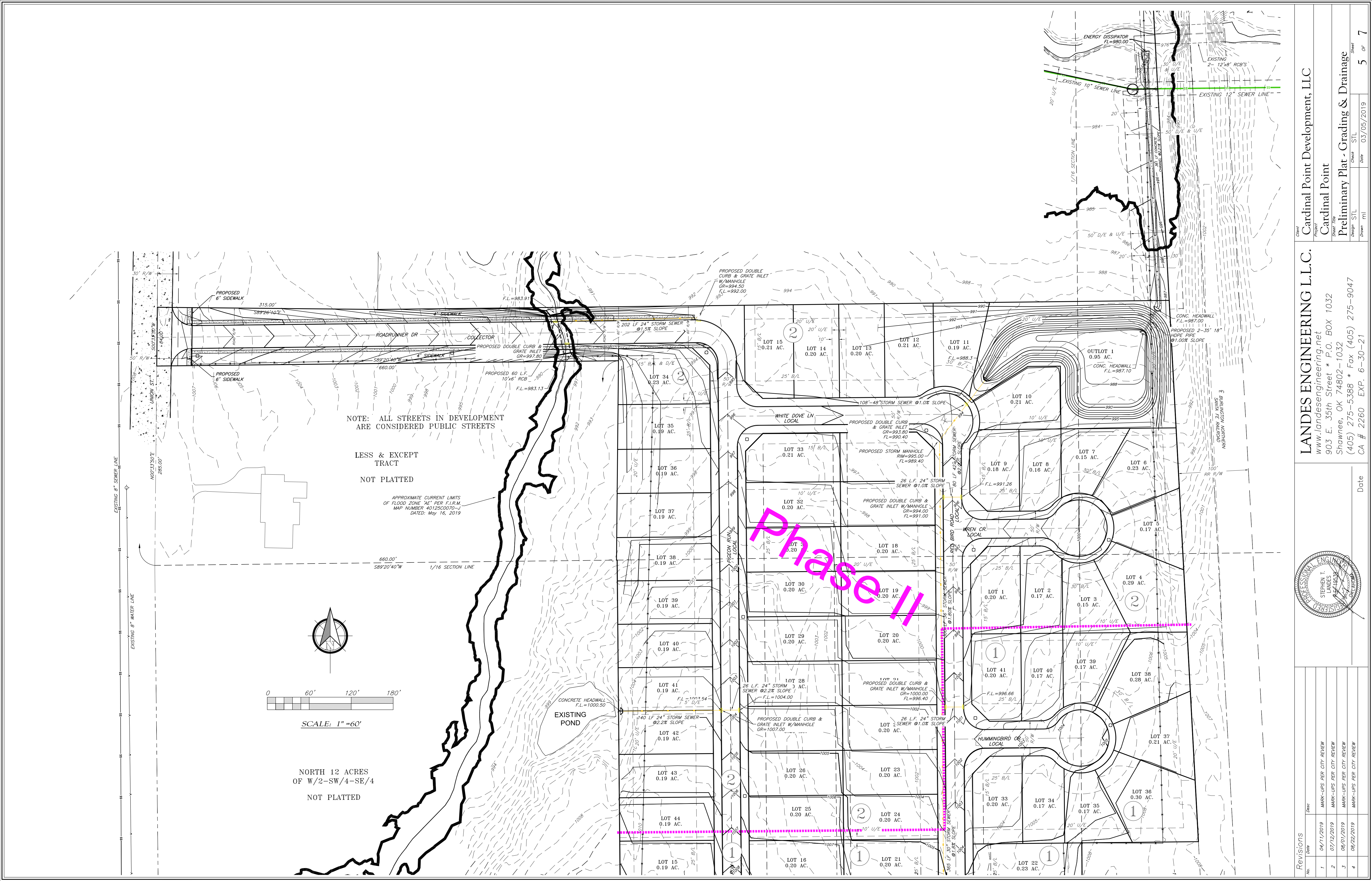
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of

7



DWG FILE: P:\ENGINEERING\2019\UNION\CARDINAL SOUTH.DWG



LANDES ENGINEERING L.L.C.

www.landesengineering.net
903 E. 35th Street * P.O. BOX 1032
Shawnee, OK 74802-1032
(405) 275-5388 * Fax (405) 275-9047
CA # 2260 EXP. 6-30-21

Cardinal Point Development, LLC

Cardinal Point

Preliminary Plat - Grading & Drainage

Revisions		Drawn	Check
No.	Date		
1	04/11/2019	MARK-UPS PER CITY REVIEW	
2	07/12/2019	MARK-UPS PER CITY REVIEW	
3	08/01/2019	MARK-UPS PER CITY REVIEW	
4	08/22/2019	MARK-UPS PER CITY REVIEW	

Date

Sheet

STL

Check

STL

Drawn

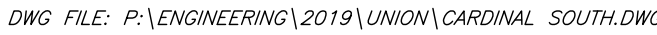
Date

03/05/2019

5

of

7

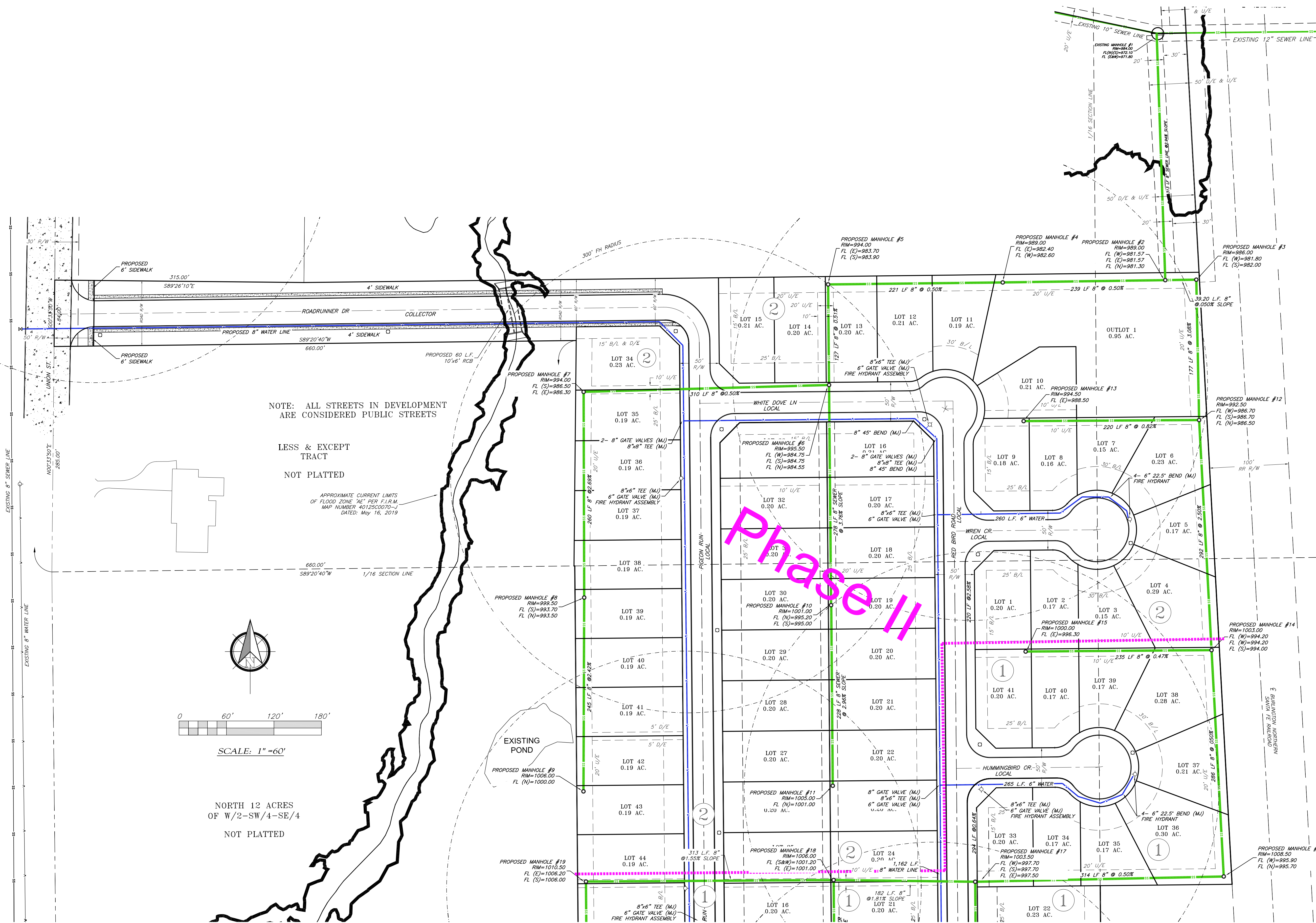


www.landeseengineering.net
903 E. 35th Street * P.O. BOX 1032
Shawnee, OK 74802-1032
(405) 275-5388 * Fax (405) 275-9047

Sheet Title
Preliminary Plat - Water & Sanitary Sewer

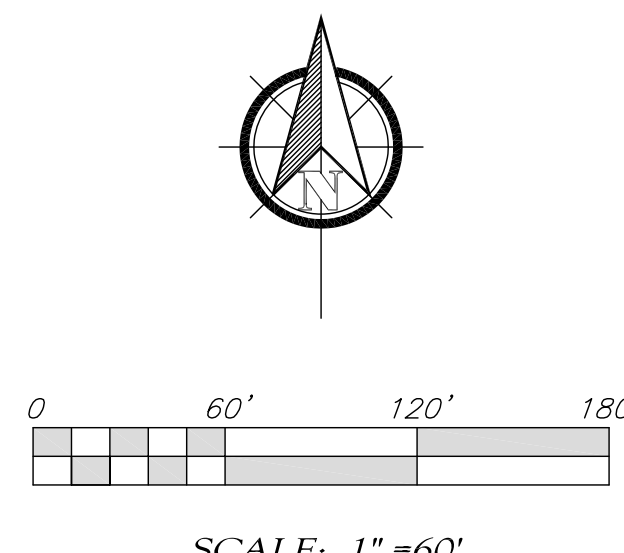
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CA # 2260 EXP. 6-30-21

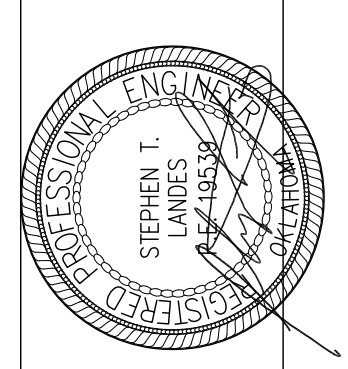


NOTE: ALL STREETS IN DEVELOPMENT
ARE CONSIDERED PUBLIC STREETS

LESS & EXCEPT
TRACT
NOT PLATTED



NORTH 12 ACRES
OF W/2-SW/4-SE/4
NOT PLATTED



LANDES ENGINEERING L.L.C.
www.landesengineering.net
903 E. 35th Street * P.O. BOX 1032
Shawnee, OK 74802-1032
(405) 275-5388 * Fax (405) 275-9047
CA # 2260 EXP. 6-30-21

Cardinal Point Development, LLC
Cardinal Point
Preliminary Plat - Water & Sanitary Sewer

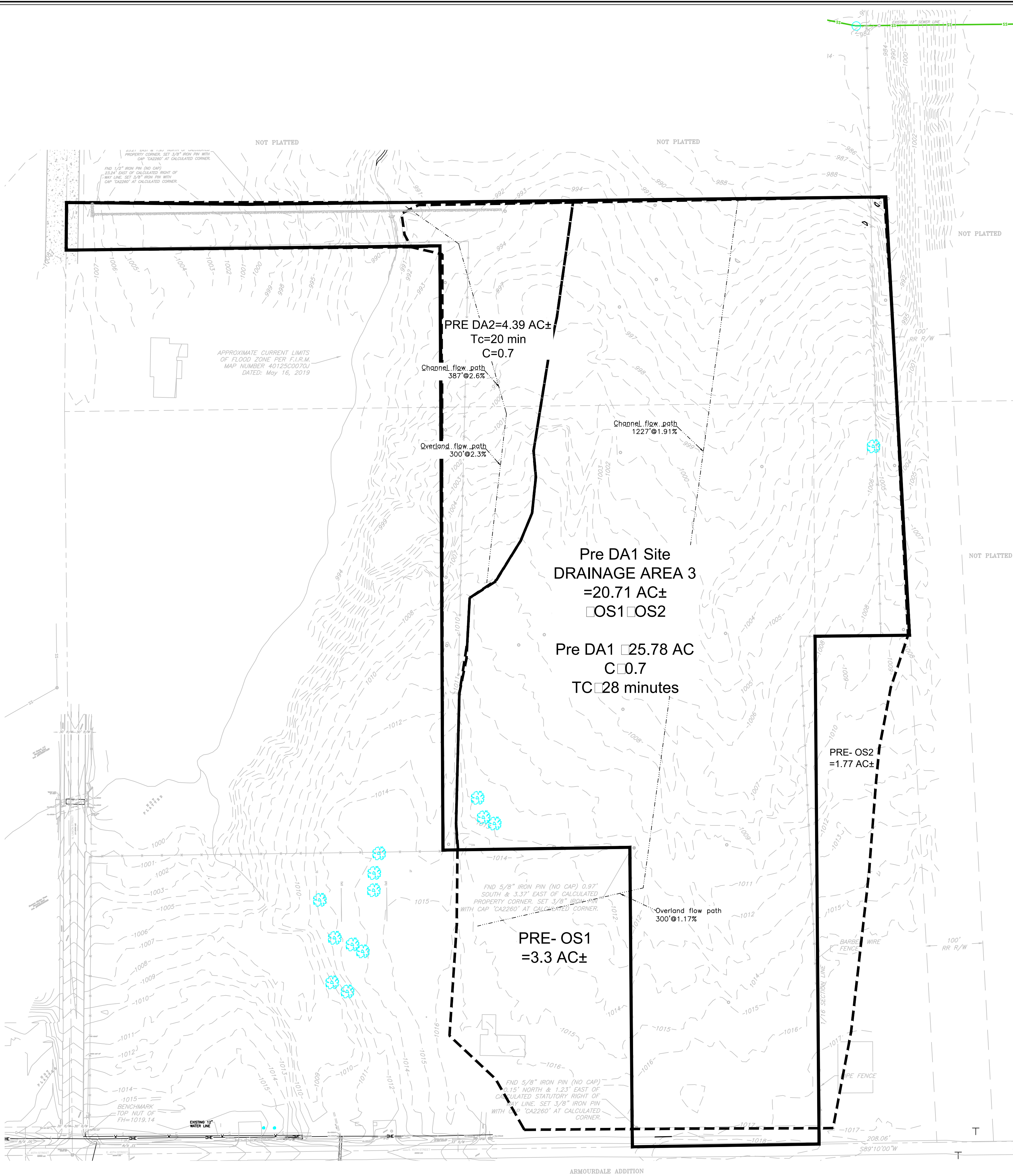
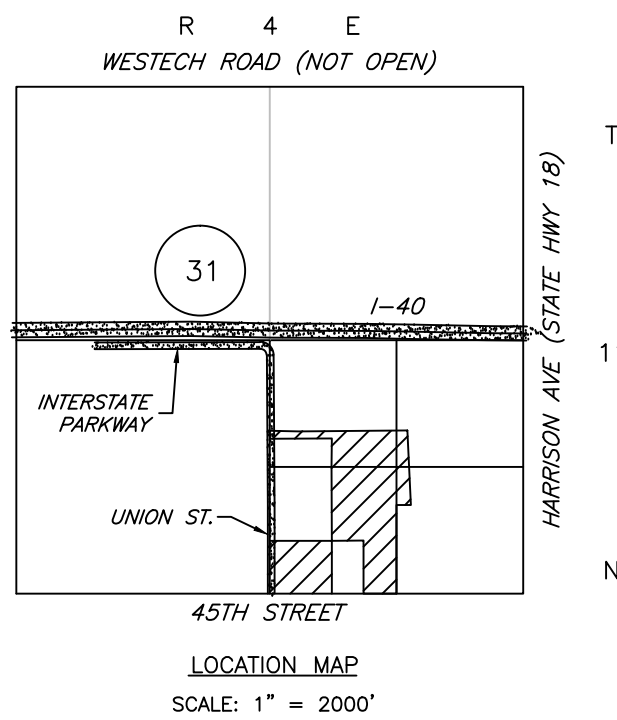
7 of 7

Revisions		Date	
No.	Desc	Mark-UPS	Per City Review
1	04/11/2019	MARK-UPS	PER CITY REVIEW
2	07/12/2019	MARK-UPS	PER CITY REVIEW
3	08/01/2019	MARK-UPS	PER CITY REVIEW
4	08/22/2019	MARK-UPS	PER CITY REVIEW

LEGAL DESCRIPTION:
A TRACT OF LAND LOCATED IN THE SOUTHEAST QUARTER (SE/4) OF SECTION TWENTY (21), TOWNSHIP ELEVEN NORTH (11N), RANGE FOUR EAST (4E) OF THE INDIAN MERIDIAN, SHAWNEE, POTTAWATOMIE COUNTY, OKLAHOMA, WITH A BASIS OF BEARING OF N00°54'43"E ALONG THE WEST LINE OF THE NORTHWEST QUARTER (NW/4) OF SAID SE/4, AND MORE PARTICULARLY DESCRIBED AS:
COMMENCING AT THE NORTHWEST CORNER (NW/C) OF SAID SE/4; THENCE S00°54'43"W ALONG THE WEST LINE OF SAID NW/4-SE/4 A DISTANCE OF 943.22 FEET TO THE POINT OF BEGINNING; THENCE S89°05'17"E A DISTANCE OF 315.00 FEET; THENCE N89°41'33"E A DISTANCE OF 1131.44 FEET TO A POINT ON THE WEST PROPERTY LINE OF THE A.T.&S.F. RAILWAY COMPANY RIGHT-OF-WAY; THENCE S02°44'42"E ALONG SAID RIGHT-OF-WAY LINE A DISTANCE OF 774.53 FEET; THENCE S89°44'50"W A DISTANCE OF 169.70 FEET TO A POINT ON THE EAST LINE OF THE SOUTHWEST QUARTER (SW/4) OF SAID SE/4; THENCE S00°08'05"E ALONG SAID EAST LINE A DISTANCE OF 896.60 FEET TO A POINT ON THE SOUTH LINE OF SAID SW/4-SE/4; THENCE S89°30'53"W ALONG SAID SOUTH LINE A DISTANCE OF 129.58 FEET; THENCE N00°08'29"W A DISTANCE OF 528.68 FEET; THENCE S89°30'54"W A DISTANCE OF 329.95 FEET; THENCE N00°10'54"W A DISTANCE OF 781.72 FEET TO A POINT ON THE NORTH LINE OF SAID SW/4-SE/4; THENCE S89°41'33"W ALONG SAID NORTH LINE A DISTANCE OF 0.98 FEET; THENCE N00°54'43"E A DISTANCE OF 285.00 FEET; THENCE S89°41'33"W A DISTANCE OF 660.00 FEET TO A POINT ON THE WEST LINE OF THE NORTHWEST QUARTER (NW/4) OF SAID SE/4; THENCE N00°54'43"E ALONG SAID WEST LINE A DISTANCE OF 84.00 FEET TO THE POINT OF BEGINNING, CONTAINING 25.16 ACRES, MORE OR LESS.
AND
A TRACT OF LAND DESCRIBED AS BEGINNING AT THE SOUTHWEST CORNER (SW/C) OF THE WEST HALF OF THE SOUTHWEST QUARTER OF THE SOUTHEAST QUARTER (W/2-SW/4-SE/4) OF SECTION THIRTY-ONE (31), TOWNSHIP ELEVEN (11) NORTH, RANGE FOUR (4) EAST OF THE INDIAN MERIDIAN; THENCE EAST 412.5 FEET; THENCE NORTH 526.80 FEET; THENCE WEST 412.5 FEET; THENCE SOUTH 526.80 FEET TO THE POINT OF BEGINNING,
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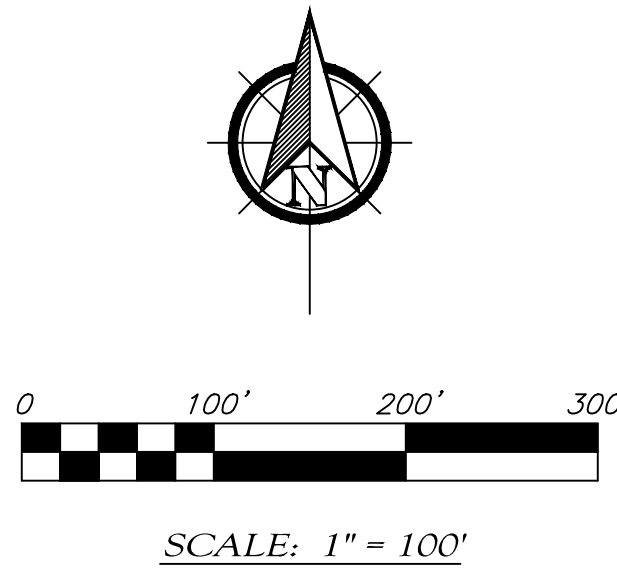
DEVELOPERS INFORMATION

CURRENTLY ZONED: C-3 & A-1
LOT 1, BLOCK 1 CURRENTLY ZONED A-1. TO BE RE-ZONED TO C-3.
LOT 20 IN BLOCK 2, & LOT 26 IN BLOCK 3 CURRENTLY ZONED C-3. TO REMAIN C-3.
REMAINDER OF PROPERTY IS CURRENTLY ZONED C-3. TO BE RE-ZONED AS R-1.
LOCATION: NE CORNER, UNION & 45TH STREET SHAWNEE, OK. 74804
OWNER & DEVELOPER: RICK LANDES
903 E. 35th STREET
SHAWNEE, OK. 74804
(405) 627-5219
PROJECT ENGINEER: STEPHEN T. LANDES
903 E. 35th ST.
SHAWNEE, OK. 74801
(405) 275-5388



PRE-DEVELOPMENT HYDROLOGY
CARDINAL POINT

A SUBDIVISION OF A PART OF THE SOUTHEAST QUARTER (SE/4) OF SECTION 31, TOWNSHIP 11 NORTH, RANGE 4 EAST OF THE INDIAN MERIDIAN, POTTAWATOMIE COUNTY, OKLAHOMA



- LEGEND
- (o) INDICATES 3/8" IRON PIN SET, W/CAP "CA 2260" (UNLESS OTHERWISE NOTED)
 - (•) INDICATES EXISTING MONUMENT
 - WATER METER
 - WATER VALVE
 - FIRE HYDRANT
 - POWER POLE
 - LIGHT POLE
 - GUY WIRE
 - GAS METER
 - VENT PIPE
 - TELEPHONE PEDESTAL
 - ELECTRIC BOX
 - CLEAN OUT
 - MANHOLE
 - STORM DRAIN
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 - SIGN
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STATISTICAL DATA

- A. 33.03 TOTAL ACRES
- B. 89 LOTS
- C. 86 SINGLE FAMILY DWELLING UNITS
- D. 3 COMMERCIAL LOTS, TOTALING 9.18 ACRES
- E. NONE
- F. NONE
- G. 4520 L.F. LOCAL STREETS
- H. NONE

STORMWATER FLOW

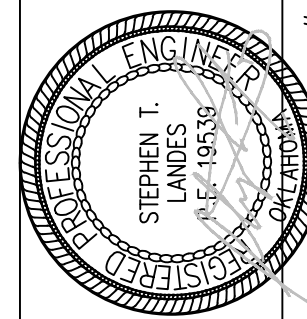
FLOOD STATEMENT
THIS PROPERTY IS PARTIALLY LOCATED IN FLOOD ZONE 'A' (NO BASE FLOOD ELEVATIONS DETERMINED) PER F.I.R.M. POTTAWATOMIE COUNTY, OKLAHOMA AND INCORPORATED AREAS, PANEL 70 OF 550, MAP NUMBER 40125C0070-H, MAP REVISED 9-3-2010.

UNDERGROUND UTILITIES NOTES
SOURCE INFORMATION FROM PLANS AND MARKINGS HAVE BEEN COMBINED WITH OBSERVED EVIDENCE OF UTILITIES TO DEVELOP A VIEW OF THOSE UNDERGROUND UTILITIES. HOWEVER, LACKING EXCAVATION, THE EXACT LOCATION OF UNDERGROUND FEATURES CANNOT BE ACCURATELY, COMPLETELY AND RELIABLY DEPICTED. WHERE ADDITIONAL OR MORE DETAILED INFORMATION IS REQUIRED, THE CLIENT IS ADVISED THAT EXCAVATION MAY BE NECESSARY.

PRELIMINARY PLAT NOTE

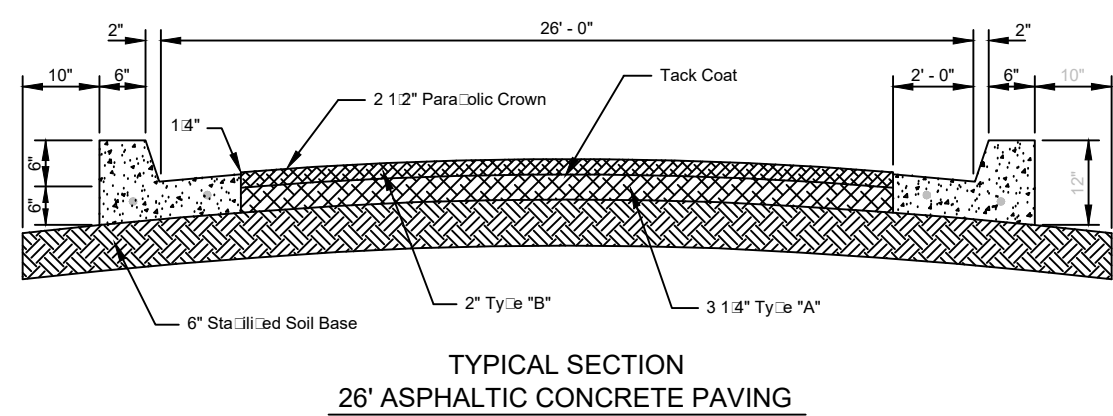
BASIS OF BEARING
BASIS OF BEARING OF S89°10'00"W ALONG THE SOUTH LINE OF THE SE/4 OF SECTION 31, T11N-R4E, 1M. BASED ON OKLAHOMA SOUTH STATE PLANE COORDINATE SYSTEM.

BENCHMARK
BENCHMARK #1 TOP NUT FH NE/CORNER 45TH & UNION TOP NUT=1019.14



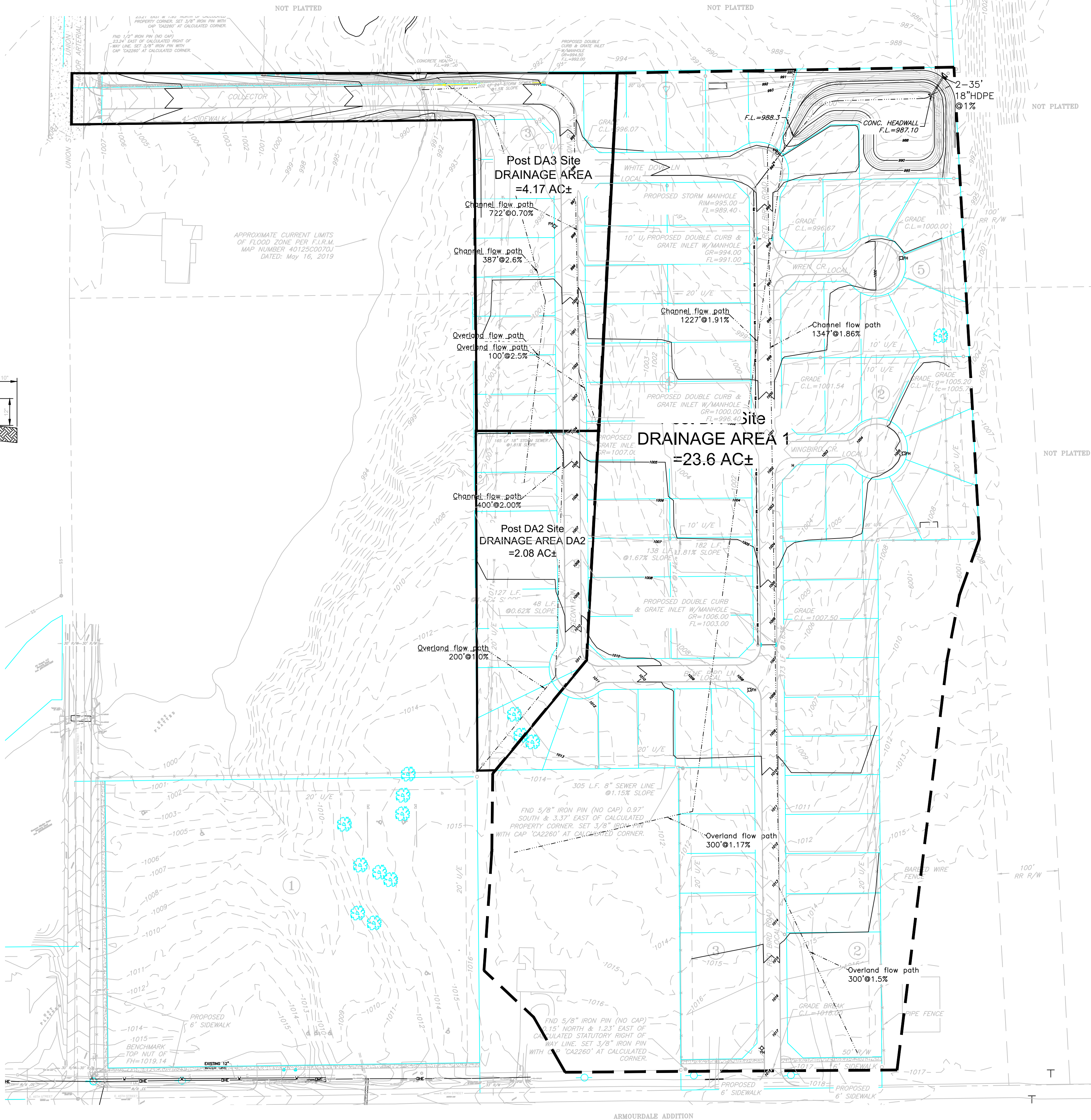
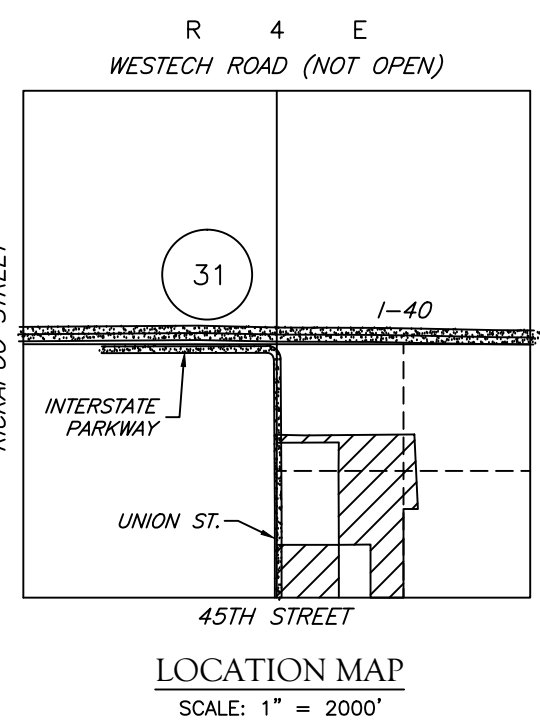
Client		Cardinal Point Development, LLC	
Project		Cardinal Pointe	
Sheet Title		Pre Development Prelim-Drairage Area	
Revisions	Design	STL	08/01/2019
	Drawn	mi	
Date		08/01/2019	H1
Sheet			H3

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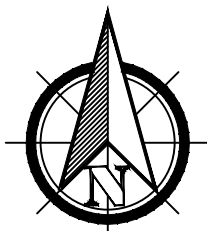
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POST-DEVELOPMENT HYDROLOGY

CARDINAL POINT

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SCALE: 1" = 100'

LEGEND

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- WATER VALVE
- FIRE HYDRANT
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PRELIMINARY PLAT NOTE

BASIS OF BEARING

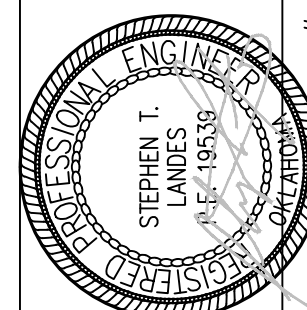
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BENCHMARK

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CA # 2260 EXP. 6-30-21



Revisions	Date	Description
1	04/11/2019	MARK-UPS PER CITY REVIEW
2	08/22/2019	MARK-UPS PER CITY REVIEW

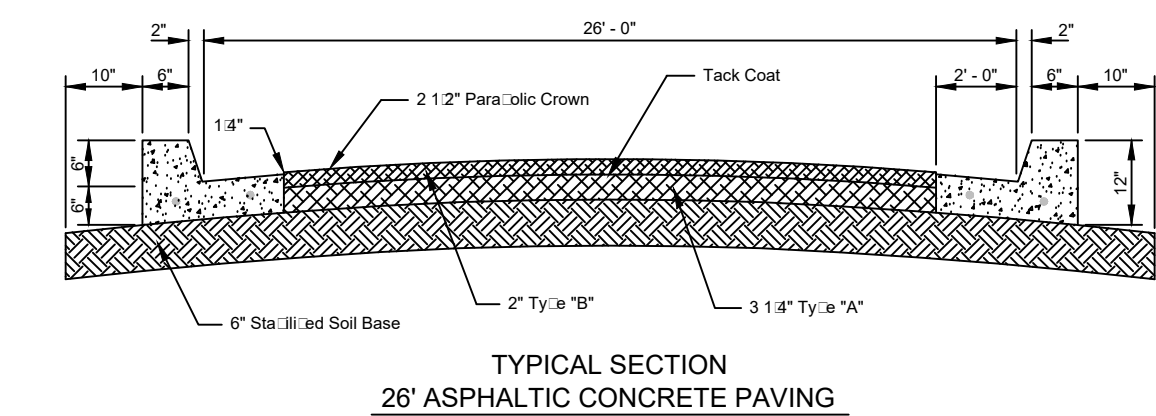
Cardinal Point Development, LLC

Cardinal Point

Post-Dev Prelim-Hydrology-Derention

Sheet Title
Design: STL
Drawn: STL
Check: STL
Date: 08/01/2019
Scale: H2
H3

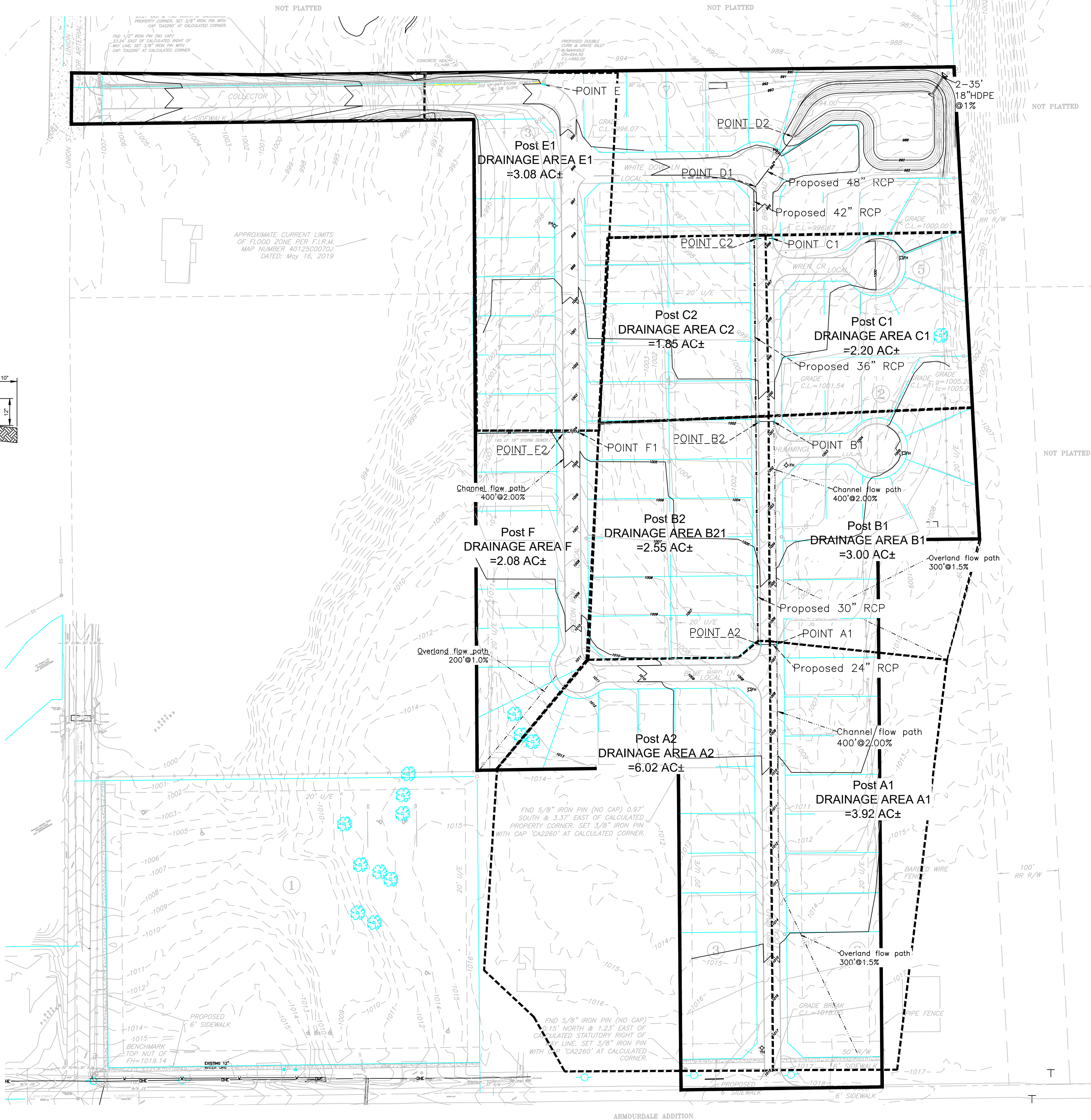
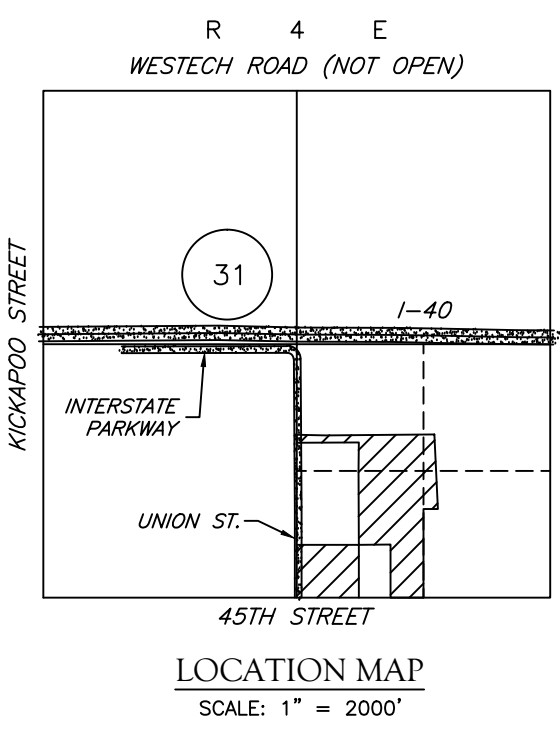
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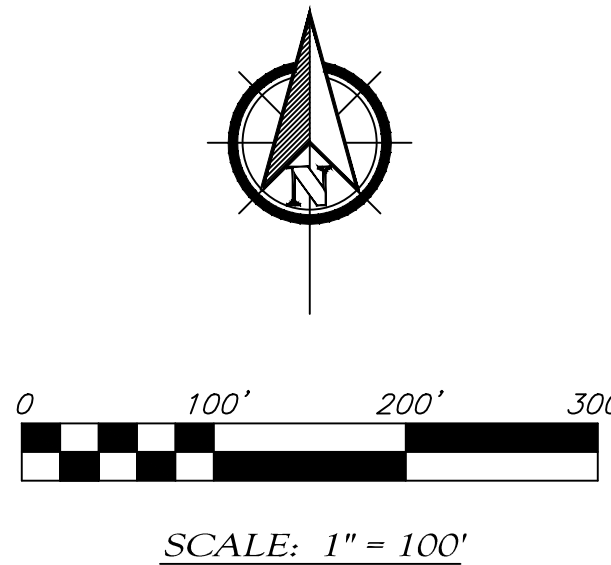
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POST DEVELOPMENT PRELIMINARY DRAINAGE DESIGN

CARDINAL POINT

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THIS PROPERTY IS PARTIALLY LOCATED IN FLOOD ZONE 'A' (NO BASE FLOOD ELEVATIONS DETERMINED) PER F.I.R.M. POTTAWATOMIE COUNTY, OKLAHOMA AND INCORPORATED AREAS, PANEL 70 OF 550, MAP NUMBER 40125C0070-H, MAP REVISED 9-3-2010.

UNDERGROUND UTILITIES NOTES

SOURCE INFORMATION FROM PLANS AND MARKINGS HAVE BEEN COMBINED WITH OBSERVED EVIDENCE OF UTILITIES TO DEVELOP A VIEW OF THOSE UNDERGROUND UTILITIES. HOWEVER, LACKING EXCAVATION, THE EXACT LOCATION OF UNDERGROUND FEATURES CANNOT BE ACCURATELY, COMPLETELY AND RELIABLY DEPICTED. WHERE ADDITIONAL OR MORE DETAILED INFORMATION IS REQUIRED, THE CLIENT IS ADVISED THAT EXCAVATION MAY BE NECESSARY.

PRELIMINARY PLAT NOTE

BASIS OF BEARING

BASIS OF BEARING OF S89°10'00"W ALONG THE SOUTH LINE OF THE SE/4 OF SECTION 31, T11N-R4E, 1M. BASED ON OKLAHOMA SOUTH STATE PLANE COORDINATE SYSTEM.

BENCHMARK

BENCHMARK #1 TOP NUT FH NE/CORNER 45TH & UNION TOP NUT=1019.14

DWS FILE: P:\ENGINEERING\2019\UNION\HYDROLOGY\CARDINAL POINT\H3.dwg

LANDES ENGINEERING L.L.C.

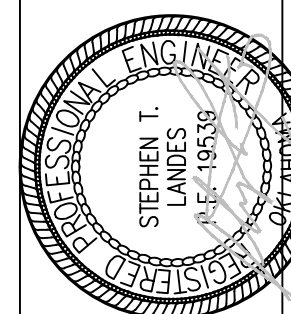
www.landesengineering.net

903 E. 35th Street * P.O. BOX 1032

Shawnee, OK 74802-1032

(405) 275-5388 * Fax (405) 275-9047

CA # 2260 EXP. 6-30-21



Stephen T. Landes, P.E. #19539

Revisions

Date	By	Remarks
04/11/2019	MARK-UPS PER CITY REVIEW	
04/22/2019	MARK-UPS PER CITY REVIEW	
05/01/2019	MARK-UPS PER CITY REVIEW	

Cardinal Point Development, LLC

Cardinal Point

Post-Development Prelim-Drainage Design

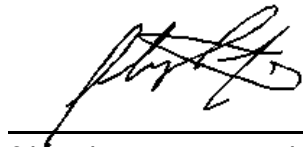
Design	Drawn	Check	Date
STL	STL	STL	08/01/2019
STL	STL	STL	08/01/2019

H3

SUB-DIVISION DEVELOPMENT

CARDINAL POINTE, SHAWNEE, OK

HYDROLOGY/DETENTION STUDY REPORT



Stephen T. Landes, P.E. #19539

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STORMWATER MANAGEMENT REPORT

Report Background

The purpose of this report is to assess and minimize the environmental impacts of storm water runoff due to construction of a subdivision of 86 lots with average lot size of 0.2 acres of 25.11 acres. The said development is located in a part of the Southeast Quarter (SE/4) of section Thirty One (31) Township Eleven North (T11N), Range Four East (R4E) of the Indian Meridian, Shawnee, Pottawatomie County, Oklahoma. More specifically the development is located between N Union Ave and Harrison Avenue along the E 45th Street West of Existing Rail road tracks. Pre & Post-Development hydrologic conditions (peak flow) within this report were modeled using the Modified Rational method with HydroCad 8.5 software. The modified rational method was used to calculate the maximum storage required for the detention purposes.

The

Precipitation

Rainfall Intensity was obtained using the following equation:

$$R = a / (T_c + b)^c$$

Where:

R = Intensity

T_c = Time of Concentration in minutes

B, D, E = Parameters defined in Figure 7.6-P for Zone 4 IDF CURVE (Pottawatomie County) Rainfall Intensity parameters obtained from Oklahoma Department of Transportation (ODOT) Roadway Drainage Manual, Nov, 2014.

Parameters	Return Period					
	2-yr	5-yr	10-yr	25-yr	50-yr	100-yr
a	46	59	69	81	106	116
b	10	11	12	12	15	15
c	0.79	0.78	0.78	0.78	0.80	0.80

Table 1: IDF Curve Coefficients

Pre-Development

Under Pre-Development conditions, a ridge at the west side running south to north splits the site into two drainage basins. The runoff from the east drainage (Pre-DA1) area drains from south to north towards the Tributary No 1 to Tributary No. 2 to Rock Creek. The runoff from the west drainage area (Pre-DA2) drains towards the Tributary No. 1-A to Tributary No. 2 to Rock Creek.

Pre-DA1

Pre Development Drainage Area Pre-DA1 consists of of 20.71 acres of the site and offsite drainage area of Pre-OS1 at the west side of the site with drainage area of 3.3 Acres and offsite drainage area Pre-OS2 at the east side of the site with drainage area of 1.77 Acres. The total Pre-DA1 with the offsite drainage areas is 25.78 Acres.

Time of concentration for the overland flow is computed by Equation 7.6(3) of the (ODOT) Roadway Drainage Manual, Nov, 2014.

Lo=300 ft, So=3.5/300=1.17%, Using K as Woodland, Thin Grass 0.942

$$T_o = \frac{k(L_o^{0.37})}{S_o^{0.20}}$$

To was calculated as 18.9 minutes

Time of concentration for the channel flow is computed by Equation 7.6(4) of the (ODOT) Roadway Drainage Manual, Nov, 2014.

Lf=1227.0 ft, So=23.6/1227=1.91%, Using K' as Average stream, few obstruction 0.00835

$$T_o = \frac{k'(L_o^{0.77})}{S_o^{0.385}}$$

Tf=9.1 minutes

Tc=To+Tf=18.9+9.1=28 minutes.

Storm Event	Runoff (cfs)
2-yr	33.56
5-yr	43.75
10-yr	50.16
25-yr	58.89
50-yr	67.56
100-yr	73.93

Table 2 Pre-Development DA-1 Runoff Summary

Pre-DA2

Pre Development Drainage Area Pre-DA2 consists of 4.39 acres draining towards Tributary No. 1-A to Tributary No. 2 to Rock Creek.

Time of concentration for the overland flow is computed by Equation 7.6(3) of the (ODOT) Roadway Drainage Manual, Nov, 2014.

Lo=300 ft, So=7/300=2.3%, Using K as Woodland, Thin Grass 0.942

$$T_o = \frac{k(L_o^{0.37})}{S_o^{0.20}}$$

To was calculated as 16.6 minutes

Time of concentration for the channel flow is computed by Equation 7.6(4) of the (ODOT) Roadway Drainage Manual, Nov, 2014.

Lf=387.0 ft, So=10/387=2.6%, Using K' as Average stream, few obstruction 0.00835

$$T_o = \frac{k'(L_o^{0.77})}{S_o^{0.385}}$$

Tf=3.4 minutes

Tc=To+Tf=16.6+3.4=20 minutes.

Storm Event	Runoff (cfs)
2-yr	6.87
5-yr	8.89
10-yr	10.14
25-yr	11.90
50-yr	13.53
100-yr	14.81

Table 3: Pre-Development DA2 Runoff Summary

Post Development

The post-development drainage area consists of three drainage area Post-DA1 and Post-DA2, Post-DA3.

The Post-DA1 consists of drainage area flowing towards a proposed detention pond at the north east corner of the property. Area=23.59.

Area consists of 23.59 acres draining towards Tributary No. 1 to Tributary No. 2 to Rock Creek. Time of concentration for the overland flow is computed by Equation 7.6(3) of the (ODOT) Roadway Drainage Manual, Nov, 2014.
Lo=300 ft, So=4.5/300=1.5%, Using K as Residential, 0.511

$$T_o = \frac{k(L_o^{0.37})}{S_o^{0.20}}$$

To was calculated as 10 minutes

Time of concentration for the channel flow is computed by Equation 7.6(4) of the (ODOT) Roadway Drainage Manual, Nov, 2014.
Lf=1347.0 ft, So=25/1347=1.86%, Using K' as Average stream, few obstruction 0.00835

$$T_o = \frac{k'(L_o^{0.77})}{S_o^{0.385}}$$

Tf=10 minutes

Tc=To+Tf=10+10=20 minutes.

Storm Event	Runoff (cfs)
2-yr	51.69
5-yr	66.87
10-yr	76.29
25-yr	89.55
50-yr	101.78
100-yr	111.38

Table 4

The Post-DA2 consists of drainage area flowing towards the curb inlet which flows towards the existing pond at the western side.

Area consists of 2.08 acres draining towards the curb inlet which flows towards the existing pond at the western side.

Time of concentration for the overland flow is computed by Equation 7.6(3) of the (ODOT) Roadway Drainage Manual, Nov, 2014.

Lo=200 ft, So=2/200=1.0%, Using K as Residential, 0.511

$$T_o = \frac{k(L_o^{0.37})}{S_o^{0.20}}$$

To was calculated as 9 minutes

Time of concentration for the channel flow is computed by Equation 7.6(4) of the (ODOT) Roadway Drainage Manual, Nov, 2014.

Lf=400 ft, So=8/400=2%, Using K' as Average stream, few obstruction 0.00835

$$T_o = \frac{k'(L_o^{0.77})}{S_o^{0.385}}$$

Tf=4 minutes

Tc=To+Tf=10+10=14 minutes. Q=CIA, C=0.7, I=Intensity at Tc=14 min

Storm Event	Intensity	Runoff (cfs)
2-yr	3.736	5.439
5-yr	4.791	6.976
10-yr	5.435	7.913
25-yr	6.38	9.289
50-yr	7.168	10.436
100-yr	7.844	11.421

Table 5: Runoff Summary from Post-DA2

The runoff from Post-DA3 flows towards the existing channel at the north western corner of the drainage area.

The Post-Development Drainage Area consists of 4.17 acres draining towards the curb inlet which flows towards the existing pond at the western side.

Time of concentration for the overland flow is computed by Equation 7.6(3) of the (ODOT) Roadway Drainage Manual, Nov, 2014.

Lo=100 ft, So=2.5/100=2.5%, Using K as Residential, 0.511

$$T_o = \frac{k(L_o^{0.37})}{S_o^{0.20}}$$

To was calculated as 6 minutes

Time of concentration for the channel flow is computed by Equation 7.6(4) of the (ODOT) Roadway Drainage Manual, Nov, 2014.

Lf=722 ft, So=5/722=0.7%, Using K' as Average stream, few obstruction 0.00835

$$T_o = \frac{k'(L_o^{0.77})}{S_o^{0.385}}$$

Tf=6 minutes

Tc=To+Tf=6+6=12 minutes. Q=CIA, C=0.7, I=Intensity of Tc=12 min

Storm Event	Intensity	Runoff (cfs)
2-yr	4.002	5.826
5-yr	5.113	7.445
10-yr	5.785	8.423
25-yr	6.791	9.887
50-yr	7.590	11.050
100-yr	8.306	12.093

Table 6: Runoff Summary from Post DA3

Storm Event	Runoff Post DA1 (cfs)	Runoff Post-DA2(cfs)	Runoff Post-DA3(cfs)	Post Dev Runoff (cfs)
2-yr	51.69	5.439	5.826	62.955
5-yr	66.87	6.976	7.445	81.291
10-yr	76.29	7.913	8.423	92.626
25-yr	89.55	9.289	9.887	108.726
50-yr	101.78	10.436	11.050	123.266
100-yr	111.38	11.421	12.093	134.894

Table 7: Post-Development Runoff Summary

Detention

All storm durations were considered, as shown in the charts below, for the different storm events to determine the maximum storage needed. The 100-year pre-developed peak flow rate, 73.93 cfs was used as the release rate and was compared to the post-developed 100 year storm event flow rates. All intensities were then modeled to determine which duration would produce the largest storage volume. The detention required for the Post-DA1

100 YEAR					
Storm Duration	Units	Rainfall Intensity	Inflow rate	Release rate	Req Storage
		in/hr	cfs	cfs	acre-ft
10		9.137538906	150.88818	73.93	1.06003
11		8.8552855	146.227329	73.93	1.095414
12		8.5919202	141.878378	73.93	1.123114
13		8.345547262	137.810022	73.93	1.143857
14		8.114520238	133.995073	73.93	1.15828
15		7.897401943	130.409798	73.93	1.166938
16		7.692931954	127.033385	73.93	1.170323
17		7.5	123.8475	73.93	1.168867
18		7.317624062	120.835926	73.93	1.162957
19		7.144932206	117.984266	73.93	1.152935

Design Storage	Design Storage
acre-feet	ft^3
1.170322542	50979.24993

As shown from the table above, comparing the pre-developed conditions 100-year storm to the post developed conditions 100-year storm the 16 minute duration for the 100-year produced the largest storage volume of 1.17 acre-ft.

Post Development Drainage Area

The detention for the stormwater runoff from the post development drainage area shall be provided by a dry detention pond located in the northeast side of the property. As shown in the stage storage report, the detention pond will store 76513 cu. Ft. at an elevation of 992.99 ft or the 100-year high water elevation. There shall be a 2' wide bank on the north east corner at an elevation of 994' to be used as an emergency spillway.

The table below shows the storm events and the storage provided at the detention pond.

Outlet Structure: The outlet structure shall be 2- 45'long 18" HDPE pipe at an invert elevation of 987.40' discharging to the existing ditch line at an elevation of 987.0'.

Storm Event	Inflow (cfs)	Outflow (cfs)	Elevation (ft)	Storage (cu. Ft.)
2-yr	57.78	24.64	990.30	27708
5-yr	74.34	28.55	991.00	38959
10-yr	84.51	30.63	991.42	46172
25-yr	99.21	33.35	992.00	56920
50-yr	111.96	35.48	992.50	66499
100-yr	122.52	37.11	992.90	74588

Table 8: Stormwater Detention flow summary

Conclusion

The results of the Pre and Post development peak discharge obtained from the analysis are shown in table below. As the tabulated results indicate, the Post-Development conditions with the construction of the proposed subdivision at Shawnee, OK will not increase the peak runoff compared to that of the pre development conditions

Storm Event	Pre Dev-DA1	Pre Dev-DA2	Pre Dev cfs	Post Dev cfs (Outflow from Det Pond)	POST DA2	POST DA3	Post Development Runoff cfs ((Outflow from Det Pond)+PostDA-2+Post DA-3)
2-yr	33.56	6.87	40.43	24.64	5.439	5.826	35.91
5-yr	43.75	8.89	52.64	28.55	6.976	7.445	42.97
10-yr	50.16	10.14	60.30	30.63	7.913	8.423	46.97
25-yr	58.89	11.90	70.79	33.35	9.289	9.887	52.53
50-yr	67.56	13.53	81.09	35.48	10.436	11.050	56.97
100-yr	73.93	14.81	88.74	37.11	11.421	12.093	60.62

PRELIMINARY DRAINAGE DESIGN

Please See Sheet H-3 Prelim Drainage Map for the Inlet locations and dimensions.

A1&A2

The preliminary drainage design for the proposed development consists of 5, points, points A through E. See below for description of each respective point.

The runoff of the post Drainage area A1 will drain towards the curb inlet. The drainage area at point A1= 3.92 acres.

Street runoff capacity (gutter)

Area consists of 3.92 acres draining towards the curb inlet.

Time of concentration for the overland flow is computed by Equation 7.6(3) of the (ODOT) Roadway Drainage Manual, Nov, 2014.

Lo=300 ft, So=4.5/300=1.5%, Using K as Residential, 0.511

$$T_o = \frac{k(L_o^{0.37})}{S_o^{0.20}}$$

To was calculated as 10 minutes

Time of concentration for the channel flow is computed by Equation 7.6(4) of the (ODOT) Roadway Drainage Manual, Nov, 2014.

Lf=400 ft, So=5.5/400=1.27%, Using K' as Average stream, few obstruction 0.00835

$$T_o = \frac{k'(L_o^{0.77})}{S_o^{0.385}}$$

Tf=5 minutes

Tc=To+Tf=10+5=15 minutes. Q=CIA, C=0.7, I=Intensity of Tc=15 min

Storm Event	I	Runoff (cfs)
2-yr	4.002	9.926
5-yr	5.113	12.751
10-yr	5.785	14.480
25-yr	6.791	16.998
50-yr	7.590	19.142
100-yr	8.306	20.948

Table 9

Street runoff capacity(gutter)

$$Q = \frac{0.56}{n} S_x^{1.67} S^{0.5} T^{2.67}$$

Where,

Sx=cross slope, 0.04

S=longitudinal slope, 0.015

T=width of flow, 13'

$$Q_{A1(\text{capacity})} = 18.73 \text{ cfs}$$

$$Q_{A1(\text{capacity})} > Q_{25}$$

Similarly for A2

$$Q_{A2(\text{capacity})} > Q_{25}$$

CAPACITY OF CURB INLETS

2-Design 2-1 Curb Inlets

$$\text{Capacity of 2 Design 2-1 Inlets} = 13.2 * 2 = 26.4 \text{ cfs} > Q_{50}$$

PIPE Underneath street sizing

24" RCP

$$n = 0.013$$

$$R = 0.5$$

$$S = 1.5\%$$

$$A = 3.14 \text{ ft}^2$$

$$Q = 1.49 / n * A * R^{(2/3)} * S^{(1/2)} = 27.76 > Q_{100}$$

PIPE FROM A2 to B2

$$\text{Capacity of curb inlets} = 26.4 * 2 = 52.8 \text{ cfs}$$

30" RCP

$$n = 0.013$$

$$\text{Slope} = 1.80\%$$

$$Q_{\text{pipe}} = 89.73 \text{ cfs} > (Q_{\text{capacity of Curb inlets}})$$

B1&B2

B1

The runoff of the post Drainage area B1 will drain towards the curb inlet. The drainage area being 3.00 acres

Street runoff capacity (gutter)

Area consists of 3.00 acres draining towards the curb inlet.

Time of concentration for the overland flow is computed by Equation 7.6(3) of the (ODOT) Roadway Drainage Manual, Nov, 2014.

$$L_o = 300 \text{ ft}, S_o = 6/300 = 2.0\%, \text{ Using } K \text{ as Residential, } 0.511$$

$$T_o = \frac{k(L_o^{0.37})}{S_o^{0.20}}$$

To was calculated as 9.3 minutes

Time of concentration for the channel flow is computed by Equation 7.6(4) of the (ODOT) Roadway Drainage Manual, Nov, 2014.

$$L_f = 256 \text{ ft}, S_o = 3.5/266 = 1.31\%, \text{ Using } K' \text{ as Average stream, few obstruction } 0.00835$$

$$T_o = \frac{k'(L_o^{0.77})}{S_o^{0.385}}$$

Tf=3.3 minutes

Tc=To+Tf=9.3+3.3=12.6. Q=CIA, C=0.7, I=Intensity of Tc=13 min

Storm Event	I	Runoff (cfs)
2-yr	3.864	8.114
5-yr	4.946	10.387
10-yr	5.603	11.767
25-yr	6.578	13.814
50-yr	7.372	15.481
100-yr	8.067	16.941

Table 10

Street runoff capacity (gutter)

$$Q = \frac{0.56}{n} S_x^{1.67} S^{0.5} T^{2.67}$$

Where,

Sx=cross slope, 0.04

S=longitudinal slope, 0.015

T=width of flow, 13'

QA1(capacity)=18.73 cfs

QA1(capacity)>Q25

Similarly for B2

QA2(capacity)>Q25

CAPACITY OF CURB INLETS

2-Design 2-1 Curb Inlets

Capacity of 2 Design 2-1 Inlets = 8.2*2=16.4 cfs>Q50

PIPE Underneath street sizing

24" RCP

n=0.013

R=0.5

S=1.5%

A=3.14 ft²

Q=1.49/n*A*R^(2/3)*S^(1/2)=27.76>Q₁₀₀

PIPE FROM B2 to C2

Capacity of curb inlets =13.2*2+13.2*2+8.2*4=85.6 cfs

36" RCP

n=0.013

Slope=1.8%

Q pipe=89.73 cfs>(Qcapacity of Curb inlets)

C1&C2

Since the Post Drainage Area C1 & C2 are smaller than B1 & B2
2-Design 2-1 Curb Inlets area adequate at Point C1 and C2

PIPE FROM C2 to D1

Capacity of curb inlets $= 13.2 \times 2 + 13.2 \times 2 + 8.2 \times 4 + 8.2 \times 4 = 118.4$ cfs

42" RCP

$n = 0.013$

Slope = 2.0%

$Q_{\text{pipe}} = 142.70 \text{ cfs} > (Q_{\text{capacity of Curb inlets}})$

PIPE Underneath street sizing

24" RCP

PIPE FROM D1 to D2

Capacity of curb inlets $= 26.4 \times 6 = 158.4$ cfs

48" RCP

$n = 0.013$

Slope = 1.0%

$Q_{\text{pipe}} = 176.4 > (Q_{\text{capacity of Curb inlets}})$

E1

Since the Post Drainage Area E1 is smaller than A1
2-Design 2-1 Curb Inlets area adequate at Point E

PIPE FROM E to channel

Capacity of curb inlets $= 26.4 \times 2 = 52.8$ cfs

24" RCP

$n = 0.013$

Slope = 1.5%

$Q_{\text{pipe}} = 58.16 > (Q_{\text{capacity of Curb inlets}})$

F1&F2

Since the Post Drainage Area F1 & F2 are smaller than C1 & C2
2-Design 2-0 Curb Inlets area adequate at Point B1 and B2

Similarly for A2

$Q_{F(\text{capacity})} > Q_{25}$

PIPE Underneath street sizing

18" RCP

PIPE FROM F2 to Pond

Capacity of curb inlets $= 8.2 \times 2 + 8.2 \times 2 = 32.8$ cfs

24" RCP

$n = 0.013$

Slope = 2.2%

$Q_{\text{pipe}} = 33.64 > (Q_{\text{capacity of Curb inlets}})$

CONCLUSION

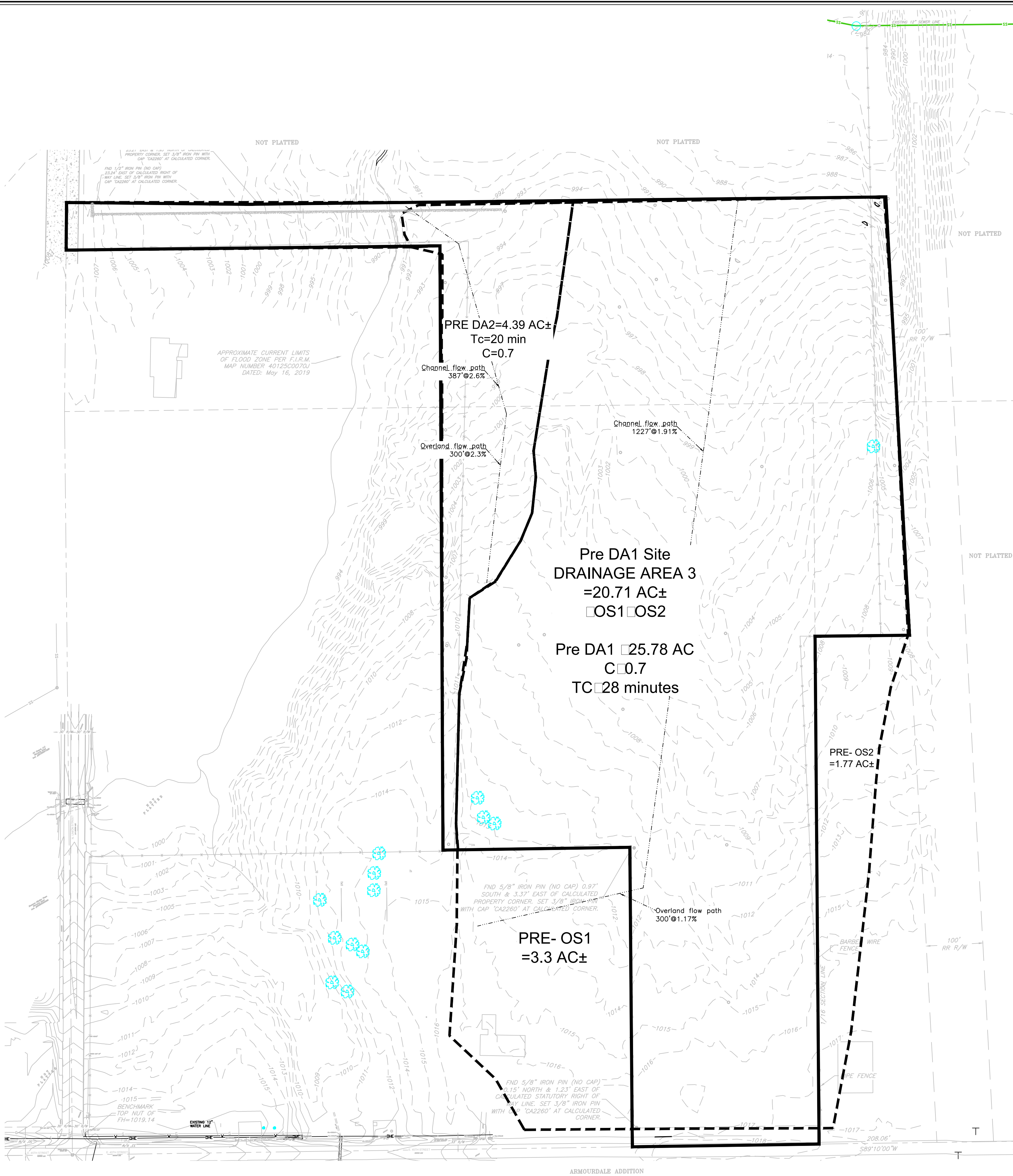
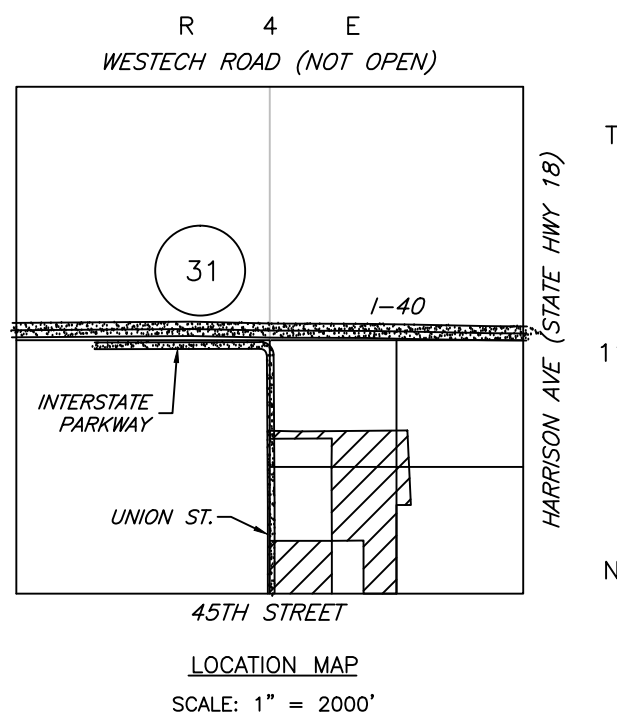
All drainage design and computations were performed in accordance with the City of Shawnee Drainage Ordinance and Subdivision Regulations. All the design either equal or exceed the requirement as indicated by City of Shawnee Drainage Ordinance and Subdivision Regulations.

**APPENDIX A: PRE-DEVELOPMENT
AND POST-DEVELOPMENT
HYDRAULIC MAPS (SEE PLANS
SHEET H1-H3)**

LEGAL DESCRIPTION:
A TRACT OF LAND LOCATED IN THE SOUTHEAST QUARTER (SE/4) OF SECTION TWENTY (21), TOWNSHIP ELEVEN NORTH (11N), RANGE FOUR EAST (4E) OF THE INDIAN MERIDIAN, SHAWNEE, POTTAWATOMIE COUNTY, OKLAHOMA, WITH A BASIS OF BEARING OF N00°54'43"E ALONG THE WEST LINE OF THE NORTHWEST QUARTER (NW/4) OF SAID SE/4, AND MORE PARTICULARLY DESCRIBED AS:
COMMENCING AT THE NORTHWEST CORNER (NW/C) OF SAID SE/4; THENCE S00°54'43"W ALONG THE WEST LINE OF SAID NW/4-SE/4 A DISTANCE OF 943.22 FEET TO THE POINT OF BEGINNING; THENCE S89°05'17"E A DISTANCE OF 315.00 FEET; THENCE N89°41'33"E A DISTANCE OF 1131.44 FEET TO A POINT ON THE WEST PROPERTY LINE OF THE A.T.&S.F. RAILWAY COMPANY RIGHT-OF-WAY; THENCE S02°44'42"E ALONG SAID RIGHT-OF-WAY LINE A DISTANCE OF 774.53 FEET; THENCE S89°44'50"W A DISTANCE OF 169.70 FEET TO A POINT ON THE EAST LINE OF THE SOUTHWEST QUARTER (SW/4) OF SAID SE/4; THENCE S00°08'05"E ALONG SAID EAST LINE A DISTANCE OF 896.60 FEET TO A POINT ON THE SOUTH LINE OF SAID SW/4-SE/4; THENCE S89°30'53"W ALONG SAID SOUTH LINE A DISTANCE OF 129.58 FEET; THENCE N00°08'29"W A DISTANCE OF 528.68 FEET; THENCE S89°30'54"W A DISTANCE OF 329.95 FEET; THENCE N00°10'54"W A DISTANCE OF 781.72 FEET TO A POINT ON THE NORTH LINE OF SAID SW/4-SE/4; THENCE S89°41'33"W ALONG SAID NORTH LINE A DISTANCE OF 0.98 FEET; THENCE N00°54'43"E A DISTANCE OF 285.00 FEET; THENCE S89°41'33"W A DISTANCE OF 660.00 FEET TO A POINT ON THE WEST LINE OF THE NORTHWEST QUARTER (NW/4) OF SAID SE/4; THENCE N00°54'43"E ALONG SAID WEST LINE A DISTANCE OF 84.00 FEET TO THE POINT OF BEGINNING, CONTAINING 25.16 ACRES, MORE OR LESS.
AND
A TRACT OF LAND DESCRIBED AS BEGINNING AT THE SOUTHWEST CORNER (SW/C) OF THE WEST HALF OF THE SOUTHWEST QUARTER OF THE SOUTHEAST QUARTER (W/2-SW/4-SE/4) OF SECTION THIRTY-ONE (31), TOWNSHIP ELEVEN (11) NORTH, RANGE FOUR (4) EAST OF THE INDIAN MERIDIAN; THENCE EAST 412.5 FEET; THENCE NORTH 526.80 FEET; THENCE WEST 412.5 FEET; THENCE SOUTH 526.80 FEET TO THE POINT OF BEGINNING,
AND
A TRACT OF LAND IN THE WEST HALF OF THE SOUTHWEST QUARTER OF THE SOUTHEAST QUARTER (W/2-SW/4-SE/4) OF SECTION THIRTY-ONE (31), TOWNSHIP ELEVEN (11) NORTH, RANGE FOUR (4) EAST OF THE INDIAN MERIDIAN, DESCRIBED AS BEGINNING 412.5 FEET EAST OF THE SOUTHWEST CORNER (SW/C) OF SAID W/2-SW/4-SE/4; THENCE EAST 247.5 FEET; THENCE NORTH 526.80 FEET; THENCE WEST 247.5 FEET; THENCE SOUTH 526.80 FEET TO THE POINT OF BEGINNING, CONTAINING 3 ACRES, MORE OR LESS.
FOR A GROSS TOTAL OF 33.03 ACRES, MORE OR LESS.

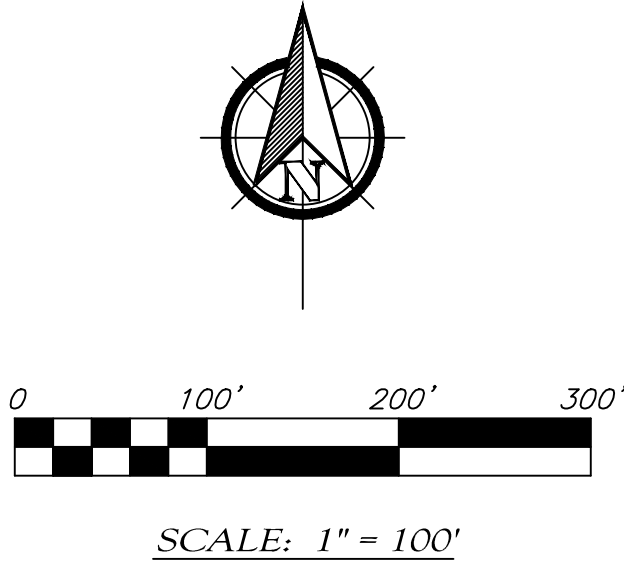
DEVELOPERS INFORMATION

CURRENTLY ZONED: C-3 & A-1
LOT 1, BLOCK 1 CURRENTLY ZONED A-1. TO BE RE-ZONED TO C-3.
LOT 20 IN BLOCK 2, & LOT 26 IN BLOCK 3 CURRENTLY ZONED C-3. TO REMAIN C-3.
REMAINDER OF PROPERTY IS CURRENTLY ZONED C-3. TO BE RE-ZONED AS R-1.
LOCATION: NE CORNER, UNION & 45TH STREET SHAWNEE, OK. 74804
OWNER & DEVELOPER: RICK LANDES
903 E. 35th STREET
SHAWNEE, OK. 74804
(405) 627-5219
PROJECT ENGINEER: STEPHEN T. LANDES
903 E. 35th ST.
SHAWNEE, OK. 74801
(405) 275-5388



PRE-DEVELOPMENT HYDROLOGY
CARDINAL POINT

A SUBDIVISION OF A PART OF THE SOUTHEAST QUARTER (SE/4) OF SECTION 31, TOWNSHIP 11 NORTH, RANGE 4 EAST OF THE INDIAN MERIDIAN, POTTAWATOMIE COUNTY, OKLAHOMA



- LEGEND
- (o) INDICATES 3/8" IRON PIN SET, W/CAP "CA 2260" (UNLESS OTHERWISE NOTED)
 - (•) INDICATES EXISTING MONUMENT
 - WATER METER
 - WATER VALVE
 - FIRE HYDRANT
 - POWER POLE
 - LIGHT POLE
 - GUY WIRE
 - GAS METER
 - VENT PIPE
 - TELEPHONE PEDESTAL
 - ELECTRIC BOX
 - CLEAN OUT
 - MANHOLE
 - STORM DRAIN
 - AIR CONDITIONER UNIT
 - SIGN
 - BENCHMARK
 - TREE
 - TUG TELEPHONE, UNDERGROUND
 - USE UNDERGROUND ELECTRIC
 - OHE OVERHEAD ELECTRIC & CABLE TV
 - FOC FIBER OPTIC CABLE
 - CATV CABLE TV
 - PET PETROLEUM LINE
 - G GAS LINE
 - HPG HIGH PRESSURE GAS LINE
 - W WATER LINE
 - SS SANITARY SEWER LINE
 - STS STORM SEWER
 - PSS PRESSURIZED SANITARY SEWER LINE
 - X FENCE
 - FLOW LINE

STATISTICAL DATA

- A. 33.03 TOTAL ACRES
- B. 89 LOTS
- C. 86 SINGLE FAMILY DWELLING UNITS
- D. 3 COMMERCIAL LOTS, TOTALING 9.18 ACRES
- E. NONE
- F. NONE
- G. 4520 L.F. LOCAL STREETS
- H. NONE

STORMWATER FLOW

FLOOD STATEMENT
THIS PROPERTY IS PARTIALLY LOCATED IN FLOOD ZONE 'A' (NO BASE FLOOD ELEVATIONS DETERMINED) PER F.I.R.M. POTTAWATOMIE COUNTY, OKLAHOMA AND INCORPORATED AREAS, PANEL 70 OF 550, MAP NUMBER 40125C0070-H, MAP REVISED 9-3-2010.

UNDERGROUND UTILITIES NOTES
SOURCE INFORMATION FROM PLANS AND MARKINGS HAVE BEEN COMBINED WITH OBSERVED EVIDENCE OF UTILITIES TO DEVELOP A VIEW OF THOSE UNDERGROUND UTILITIES. HOWEVER, LACKING EXCAVATION, THE EXACT LOCATION OF UNDERGROUND FEATURES CANNOT BE ACCURATELY, COMPLETELY AND RELIABLY DEPICTED. WHERE ADDITIONAL OR MORE DETAILED INFORMATION IS REQUIRED, THE CLIENT IS ADVISED THAT EXCAVATION MAY BE NECESSARY.

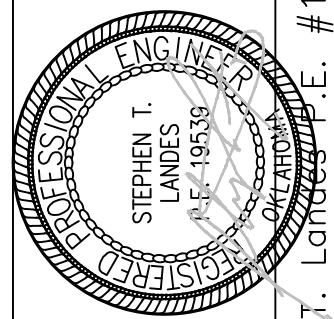
PRELIMINARY PLAT NOTE

BASIS OF BEARING
BASIS OF BEARING OF S89°10'00"W ALONG THE SOUTH LINE OF THE SE/4 OF SECTION 31, T11N-R4E, 1M. BASED ON OKLAHOMA SOUTH STATE PLANE COORDINATE SYSTEM.

BENCHMARK
BENCHMARK #1 TOP NUT FH NE/CORNER 45TH & UNION TOP NUT=1019.14

LANDES ENGINEERING L.L.C.

www.landesengineering.net
903 E. 35th Street * P.O. BOX 1032
Shawnee, OK 74802-1032
(405) 275-5388 * Fax (405) 275-9047
CA # 2260 EXP. 6-30-21



Revisions

Date	Revised By	Revised For
04/11/2019	MARK-UPS	REV. CITY REVIEW

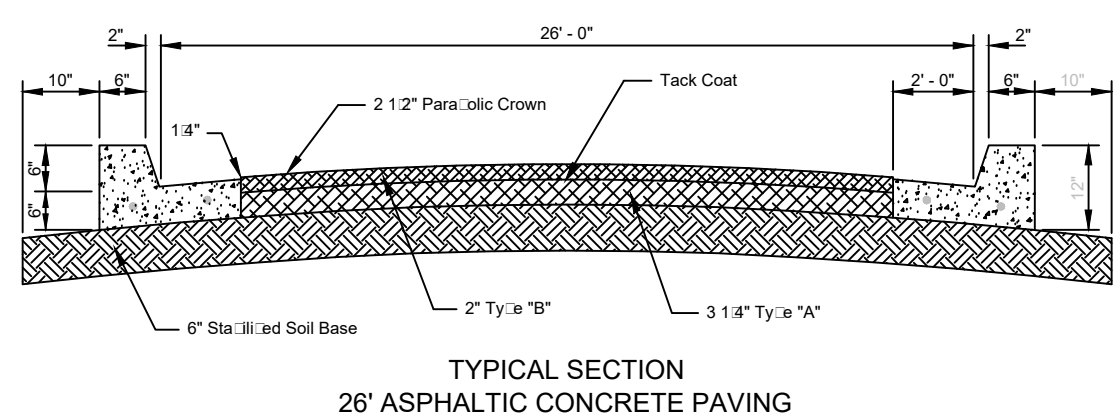
Cardinal Point Development, LLC

Cardinal Pointe

Pre Development Prelim-Drairage Area

Design	STL	STL	Date	Sheet
Drawn	mi		08/01/2019	H1
				H3

LEGAL DESCRIPTION:
A TRACT OF LAND LOCATED IN THE SOUTHEAST QUARTER (SE/4) OF SECTION TWENTY (21), TOWNSHIP ELEVEN NORTH (11N), RANGE FOUR EAST (4E) OF THE INDIAN MERIDIAN, SHAWNEE, POTTAWATOMIE COUNTY, OKLAHOMA, WITH A BASIS OF BEARING OF N00°54'43"E ALONG THE WEST LINE OF THE NORTHWEST QUARTER (NW/4) OF SAID SE/4, AND MORE PARTICULARLY DESCRIBED AS:
COMMENCING AT THE NORTHWEST CORNER (NW/C) OF SAID SE/4; THENCE S00°54'43"W ALONG THE WEST LINE OF SAID NW/4-SE/4 A DISTANCE OF 943.22 FEET TO THE POINT OF BEGINNING; THENCE S89°05'17"E A DISTANCE OF 315.00 FEET; THENCE N84°13'32"E A DISTANCE OF 1131.44 FEET TO A POINT ON THE WEST PROPERTY LINE OF THE A.T.&S.F. RAILWAY COMPANY RIGHT-OF-WAY; THENCE S02°44'42"E ALONG SAID RIGHT-OF-WAY LINE A DISTANCE OF 774.53 FEET; THENCE S89°44'50"W A DISTANCE OF 169.70 FEET TO A POINT ON THE EAST LINE OF THE SOUTHWEST QUARTER (SW/4) OF SAID SE/4; THENCE S00°06'05"E ALONG SAID EAST LINE A DISTANCE OF 896.60 FEET TO A POINT ON THE SOUTH LINE OF SAID SW/4-SE/4; THENCE S88°30'53"W ALONG SAID SOUTH LINE A DISTANCE OF 129.58 FEET; THENCE N00°08'29"W A DISTANCE OF 528.68 FEET; THENCE S89°30'54"W A DISTANCE OF 329.95 FEET; THENCE N00°10'54"W A DISTANCE OF 781.72 FEET TO A POINT ON THE NORTH LINE OF SAID SW/4-SE/4; THENCE S89°41'33"W ALONG SAID NORTH LINE A DISTANCE OF 0.98 FEET; THENCE N00°54'43"E A DISTANCE OF 285.00 FEET; THENCE S89°41'33"W A DISTANCE OF 660.00 FEET TO A POINT ON THE WEST LINE OF THE NORTHWEST QUARTER (NW/4) OF SAID SE/4; THENCE N00°54'43"E ALONG SAID WEST LINE A DISTANCE OF 84.00 FEET TO THE POINT OF BEGINNING, CONTAINING 25.16 ACRES, MORE OR LESS.
AND
A TRACT OF LAND DESCRIBED AS BEGINNING AT THE SOUTHWEST CORNER (SW/C) OF THE WEST HALF OF THE SOUTHWEST QUARTER OF THE SOUTHEAST QUARTER (W/2-SW/4-SE/4) OF SECTION THIRTY-ONE (31), TOWNSHIP ELEVEN (11) NORTH, RANGE FOUR (4) EAST OF THE INDIAN MERIDIAN; THENCE EAST 412.5 FEET; THENCE NORTH 526.80 FEET; THENCE WEST 412.5 FEET; THENCE SOUTH 526.80 FEET TO THE POINT OF BEGINNING,
AND
A TRACT OF LAND IN THE WEST HALF OF THE SOUTHWEST QUARTER OF THE SOUTHEAST QUARTER (W/2-SW/4-SE/4) OF SECTION THIRTY-ONE (31), TOWNSHIP ELEVEN (11) NORTH, RANGE FOUR (4) EAST OF THE INDIAN MERIDIAN, DESCRIBED AS BEGINNING 412.5 FEET EAST OF THE SOUTHWEST CORNER (SW/C) OF SAID W/2-SW/4-SE/4; THENCE EAST 247.5 FEET; THENCE NORTH 526.80 FEET; THENCE WEST 247.5 FEET; THENCE SOUTH 526.80 FEET TO THE POINT OF BEGINNING, CONTAINING 3 ACRES, MORE OR LESS.
FOR A GROSS TOTAL OF 33.03 ACRES, MORE OR LESS.

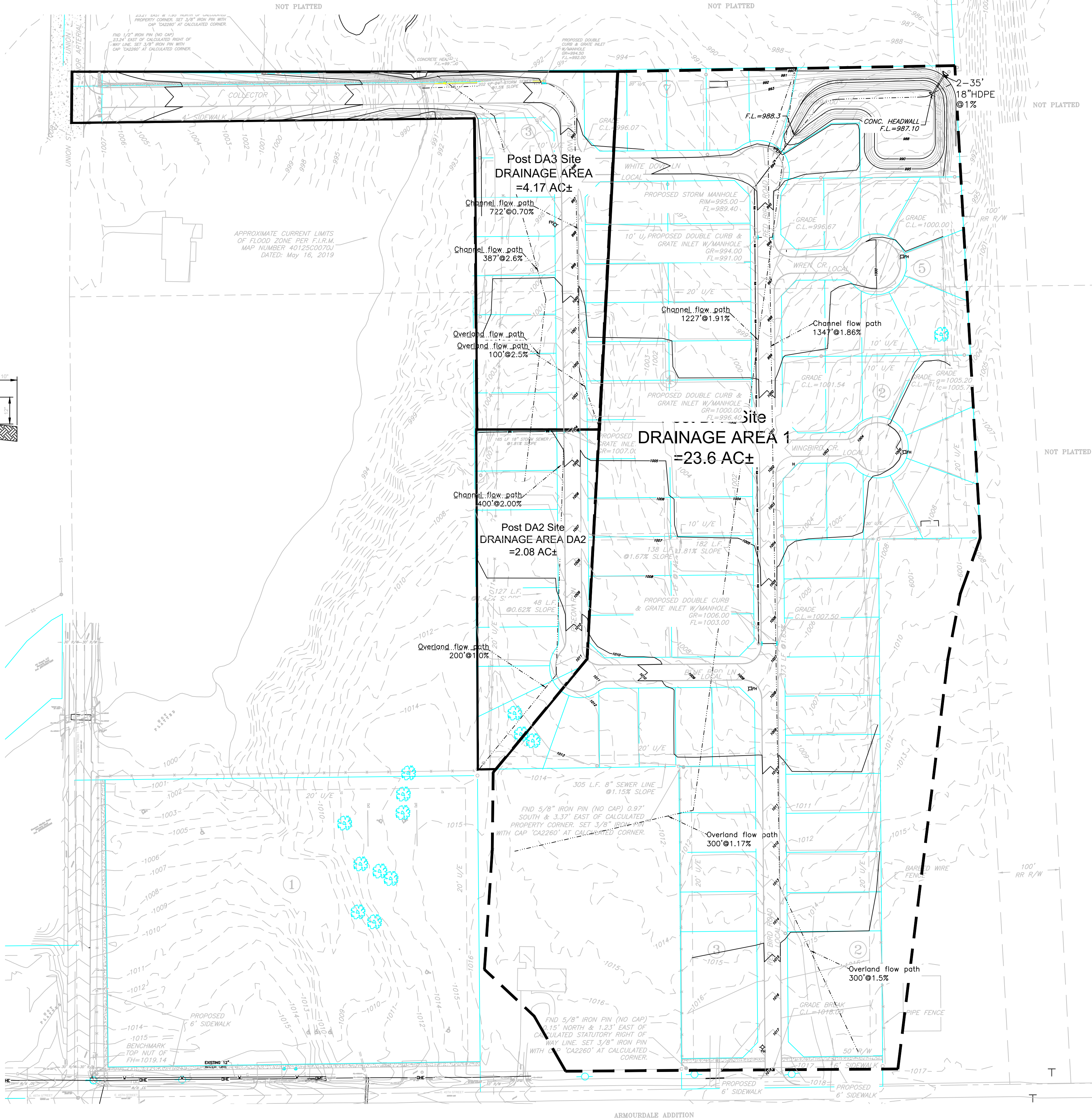
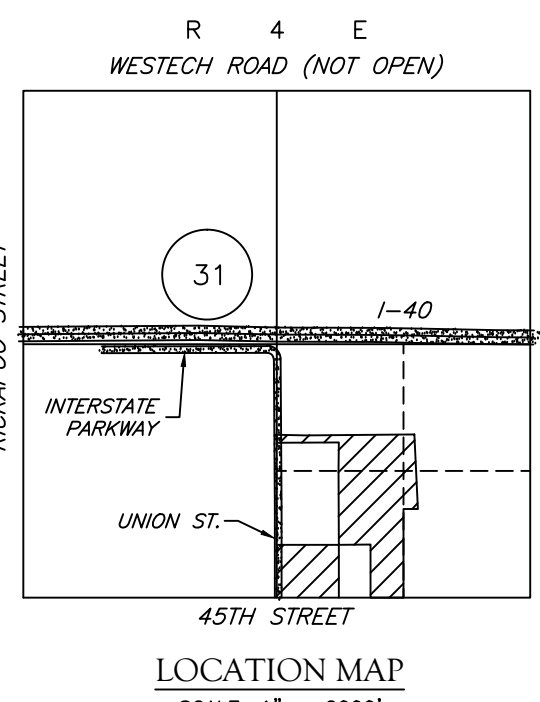


DEVELOPERS INFORMATION

CURRENTLY ZONED: C-3 & A-1
LOT 1, BLOCK 1 CURRENTLY ZONED A-1. TO BE RE-ZONED TO C-3.
LOT 20 IN BLOCK 2, & LOT 26 IN BLOCK 3 CURRENTLY ZONED C-3. TO REMAIN C-3.
REMAINDER OF PROPERTY IS CURRENTLY ZONED C-3. TO BE RE-ZONED AS R-1.
LOCATION: NE CORNER, UNION & 45TH STREET SHAWNEE, OK. 74804

OWNER & DEVELOPER: RICK LANDES
903 E. 35th STREET
SHAWNEE, OK. 74804
(405) 627-5219

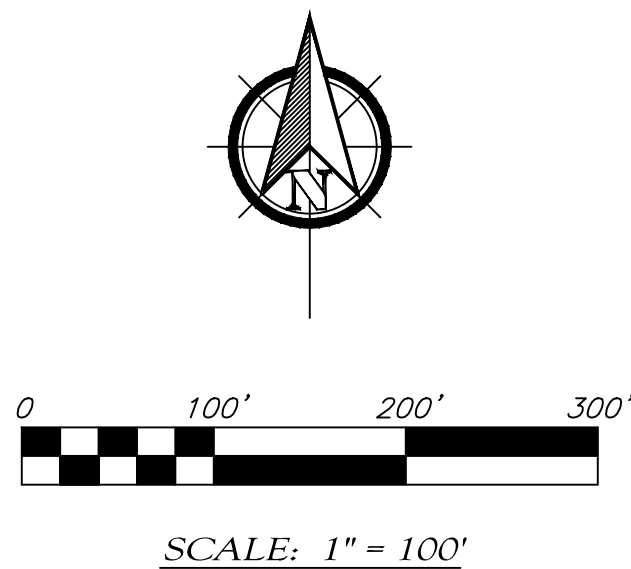
PROJECT ENGINEER: STEPHEN T. LANDES
903 E. 35th ST.
SHAWNEE, OK. 74801
(405) 275-5388



POST-DEVELOPMENT HYDROLOGY

CARDINAL POINT

A SUBDIVISION OF A PART OF THE SOUTHEAST QUARTER (SE/4) OF SECTION 31, TOWNSHIP 11 NORTH, RANGE 4 EAST OF THE INDIAN MERIDIAN, POTTAWATOMIE COUNTY, OKLAHOMA



LEGEND

- (o) INDICATES 3/8" IRON PIN SET, W/CAP "CA 2260" (UNLESS OTHERWISE NOTED)
- (•) INDICATES EXISTING MONUMENT
- WATER METER
- WATER VALVE
- FIRE HYDRANT
- POWER POLE
- LIGHT POLE
- GUY WIRE
- GAS METER
- VENT PIPE
- TELEPHONE PEDESTAL
- ELECTRIC BOX
- CLEAN OUT
- MANHOLE
- STORM DRAIN
- AIR CONDITIONER UNIT
- SIGN
- BENCHMARK
- TREE
- TUG TELEPHONE, UNDERGROUND
- USE UNDERGROUND ELECTRIC
- OHE OVERHEAD ELECTRIC & CABLE TV
- FOC FIBER OPTIC CABLE
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- C GAS LINE
- HPG HIGH PRESSURE GAS LINE
- W WATER LINE
- SS SANITARY SEWER LINE
- STS STORM SEWER
- PSS PRESSURIZED SANITARY SEWER LINE
- X FENCE
- FLOW LINE

STATISTICAL DATA

- A. 33.03 TOTAL ACRES
- B. 89 LOTS
- C. 86 SINGLE FAMILY DWELLING UNITS
- D. 3 COMMERCIAL LOTS, TOTALING 9.18 ACRES
- E. NONE
- F. NONE
- G. 4520 L.F. LOCAL STREETS
- H. NONE

FLOOD STATEMENT

THIS PROPERTY IS PARTIALLY LOCATED IN FLOOD ZONE 'A' (NO BASE FLOOD ELEVATIONS DETERMINED) PER F.I.R.M. POTTAWATOMIE COUNTY, OKLAHOMA AND INCORPORATED AREAS, PANEL 70 OF 550, MAP NUMBER 40125C0070-H, MAP REVISED 9-3-2010.

UNDERGROUND UTILITIES NOTES

SOURCE INFORMATION FROM PLANS AND MARKINGS HAVE BEEN COMBINED WITH OBSERVED EVIDENCE OF UTILITIES TO DEVELOP A VIEW OF THOSE UNDERGROUND UTILITIES. HOWEVER, LACKING EXCAVATION, THE EXACT LOCATION OF UNDERGROUND FEATURES CANNOT BE ACCURATELY, COMPLETELY AND RELIABLY DEPICTED. WHERE ADDITIONAL OR MORE DETAILED INFORMATION IS REQUIRED, THE CLIENT IS ADVISED THAT EXCAVATION MAY BE NECESSARY.

PRELIMINARY PLAT NOTE

BASIS OF BEARING

BASIS OF BEARING OF S89°10'00"W ALONG THE SOUTH LINE OF THE SE/4 OF SECTION 31, T11N-R4E, 1M. BASED ON OKLAHOMA SOUTH STATE PLANE COORDINATE SYSTEM.

BENCHMARK

BENCHMARK #1 TOP NUT FH NE/CORNER 45TH & UNION TOP NUT=1019.14

LANDES ENGINEERING L.L.C.

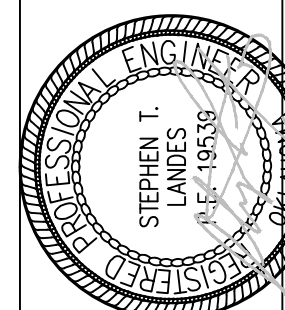
www.landesengineering.net

903 E. 35th Street * P.O. BOX 1032

Shawnee, OK 74802-1032

(405) 275-5388 * Fax (405) 275-9047

CA # 2260 EXP. 6-30-21



Stephen T. Landes P.E. #19539

Date

Revisions

Date

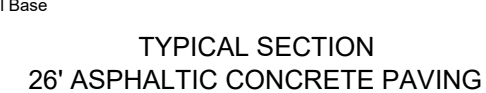
04/11/2019 MARK-UPS PER CITY REVIEW

08/22/2019 MARK-UPS PER CITY REVIEW

08/22/2019

COMMENCING AT THE NORTHWEST CORNER (NW/C) OF SAID SE¼; THENCE S08°44'W A DISTANCE OF 56.79 FEET TO A POINT ON THE SOUTH LINE OF SAID SE¼; THENCE S88°05'17" W A DISTANCE OF 315.00 FEET; THENCE S89°41'33"E A DISTANCE OF 1131.44 FEET TO A POINT ON THE WEST PROPERTY LINE OF THE A.T.S.#1 TRACT, BEING 1/4 SECTION 36, T1N, R1E, S4E, CONTAINING 40 ACRES, MORE OR LESS, COMMENCING AT THE NORTHEAST CORNER (NE/C) OF SAID SE¼; THENCE S89°41'33"E A DISTANCE OF 774.83 FEET; THENCE S68°44'50"W A DISTANCE OF 166.70 FEET TO A POINT ON THE EAST LINE OF SAID SE¼; THENCE S89°41'33"E A DISTANCE OF 166.70 FEET ALONG SAID EAST LINE TO A DISTANCE OF 886.60 FEET TO A POINT ON THE SOUTH LINE OF SAID SE¼-S4E; THENCE S89°30'53"W ALONG SAID SOUTH LINE A DISTANCE OF 329.58 FEET; THENCE N00°10'54"W ALONG SAID WEST LINE A DISTANCE OF 781.72 FEET TO A POINT ON THE NORTH LINE OF SAID SE¼-S4E; THENCE S89°41'33"W ALONG SAID NORTH LINE A DISTANCE OF 0.98 FEET TO THE NORTHEAST CORNER (NE/C) OF SAID SE¼; THENCE S89°41'33"E A DISTANCE OF 660.00 FEET TO A POINT ON THE WEST LINE OF THE NORTHWEST QUARTER (NW¼) OF SAID SECTION 36, T1N, R1E, S4E, CONTAINING 40 ACRES, MORE OR LESS; THENCE S89°41'33"E A DISTANCE OF 84.00 FEET TO THE POINT OF BEGINNING, CONTAINING 25.16 ACRES, MORE OR LESS.

AND
A TRACT OF LAND IN THE WEST HALF OF THE SOUTHWEST QUARTER OF THE SOUTHEAST
QUARTER (W/2-SW/4-SE/4) OF SECTION THIRTY-ONE (31), TOWNSHIP ELEVEN (11) NORTH,
RANGE FOUR (4) EAST OF THE INDIAN MERIDIAN, DESCRIBED AS BEGINNING 412.5 FEET EAST
OF THE SOUTHWEST CORNER (SW/C) OF SAID W/2-SW/4-SE/4; THENCE EAST 247.5 FEET;
THENCE NORTH 526.80 FEET; THENCE WEST 247.5 FEET; THENCE SOUTH 526.80 FEET TO THE
POINT OF BEGINNING, CONTAINING 3 ACRES, MORE OR LESS.
FOR A GROSS TOTAL OF 33.03 ACRES, MORE OR LESS.



CURRENTLY ZONED: C-3 & A-1
LOT 1, BLOCK 1 CURRENTLY
ZONED A-1. TO BE RE-ZONED

LOT 20 IN BLOCK 2, & LOT 26
IN BLOCK 3 CURRENTLY ZONED
C-3, TO REMAIN C-3.

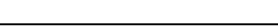
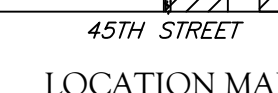
REMAINDER OF PROPERTY IS
CURRENTLY ZONED C-3. TO BE
BE ZONED AS R-1.

RE-ZONED AS R-1.

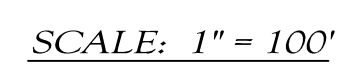
LOCATION: NE CORNER, UNION & 45TH STREET
SHAWNEE, OK. 74804

OWNER & DEVELOPER: RICK LANDES
903 E. 35th STREET
SHAWNEE, OK. 74804

PROJECT ENGINEER: STEPHEN T. LANDES
903 E. 35TH ST.



A SUBDIVISION OF A PART OF THE SOUTHEAST QUARTER (SE/4,
OF SECTION 31, TOWNSHIP 11 NORTH, RANGE 4 EAST OF THE
INDIAN MERIDIAN, POTTAWATOMIE COUNTY, OKLAHOMA



(o) INDICATES 3/8" IRON PIN SET,
W/CAP "CA 2260" (UNLESS
OTHERWISE NOTED)

- (●) INDICATES EXISTING MONUMENT
- WATER METER
 - ⊕ WATER VALVE
 - ⊗ FIRE HYDRANT
 - POWER POLE
 - LIGHT POLE
 - GUY WIRE
 - ⊗ GAS METER
 - VENT PIPE
 - ⊕ TELEPHONE PEDestal
 - ⊕ ELECTRIC BOX
 - CLEAN OUT
 - MANHOLE
 - STORM DRAIN
 - ⊗ AIR CONDITIONER UNIT
 - SIGN
 - ◆ BENCHMARK
-  TREE
- TUG— TELEPHONE, UNDERGROUND
- UGE— UNDERGROUND ELECTRIC
- OHE— OVERHEAD ELECTRIC & CABLE TV
- FOF— FIBER OPTIC CABLE
- CATV— CABLE TV
- PET— PETROLEUM LINE
- G— GAS LINE
- HPO— HIGH PRESSURE GAS LINE
- W— WATER LINE
- SS— SANITARY SEWER LINE
- STS— STORM SEWER
- PSS— PRESSURIZED SANITARY SEWER LINE
- X— FENCE
- — — FLOW LINE

A. 33.03 TOTAL ACRES
B. 89 LOTS
C. 86 SINGLE FAMILY DWELLING UNITS
D. 3 COMMERCIAL LOTS, TOTALING 9.18 ACRES
E. NONE
F. NONE
G. 4520 L.F. LOCAL STREETS
H. NONE

FLOOD STATEMENT

THIS PROPERTY IS PARTIALLY LOCATED IN FLOOD ZONE 'A' (NO BASE FLOOD ELEVATIONS DETERMINED) PER F.I.R.M. POTTAWATOMIE COUNTY, OKLAHOMA AND INCORPORATED AREAS, PANEL 70 OF 550, MAP NUMBER 40125C0070-H, MAP REVISED 9-3-2010.

SOURCE INFORMATION FROM PLANS AND MARKINGS HAVE BEEN COMBINED WITH OBSERVED EVIDENCE OF UTILITIES TO DEVELOP A VIEW OF THOSE UNDERGROUND UTILITIES. HOWEVER, LACKING EXCAVATION, THE EXACT LOCATION OF UNDERGROUND FEATURES CANNOT BE ACCURATELY, COMPLETELY AND RELIABLY DEPICTED. WHERE ADDITIONAL OR MORE DETAILED INFORMATION IS REQUIRED, THE CLIENT IS ADVISED THAT EXCAVATION MAY BE NECESSARY.

BASIS OF BEARING

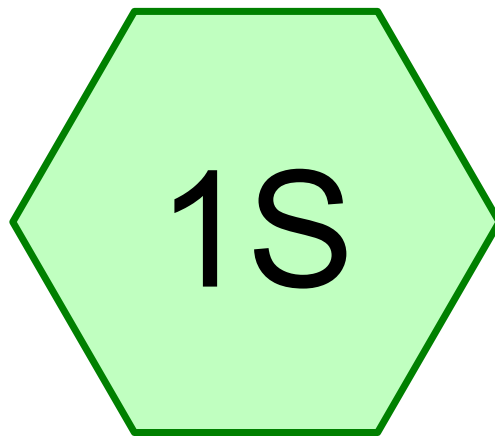
BASIS OF BEARING OF S89°10'00"W ALONG THE SOUTH LINE OF THE SE/4 OF SECTION 31, T11N-R4E, I.M. BASED ON OKLAHOMA SOUTH STATE PLANE COORDINATE SYSTEM.

BENCHMARK #1 TOP NUT FH
NE/CORNER 45TH & UNION
TOP NUT=1019.14

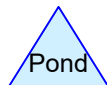
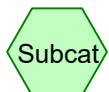
DWG FILE: P:\ENGINEERING\2019\UNION\HYDROLOGY\CARDINAL⁶\SOUTH-H.DWG

[illegible]

APPENDIX B: PRE DEVELOPMENT HYDROLOGY



Pre Dev Drainage Area DA1



Drainage Diagram for PRE DEVELOPMENT DRAINAGE AREA DA1
Prepared by LANDES ENGINEERING LLC
HydroCAD® 8.50 s/n 002876 © 2007 HydroCAD Software Solutions LLC

PRE DEVELOPMENT DRAINAGE AREA DA1

Prepared by LANDES ENGINEERING LLC

HydroCAD® 8.50 s/n 002876 © 2007 HydroCAD Software Solutions LLC

Page 2

Area Listing (all nodes)

Area (acres)	C	Description (subcatchment-numbers)
25.780	0.50	GRASS (1S)

PRE DEVELOPMENT DRAINAGE AREA DA1

Shawnee 2-Year Duration=28 min, Inten=2.60 in/hr

Prepared by LANDES ENGINEERING LLC

HydroCAD® 8.50 s/n 002876 © 2007 HydroCAD Software Solutions LLC

Page 3

Summary for Subcatchment 1S: Pre Dev Drainage Area DA1

Runoff = 33.56 cfs @ 0.47 hrs, Volume= 1.303 af, Depth= 0.61"

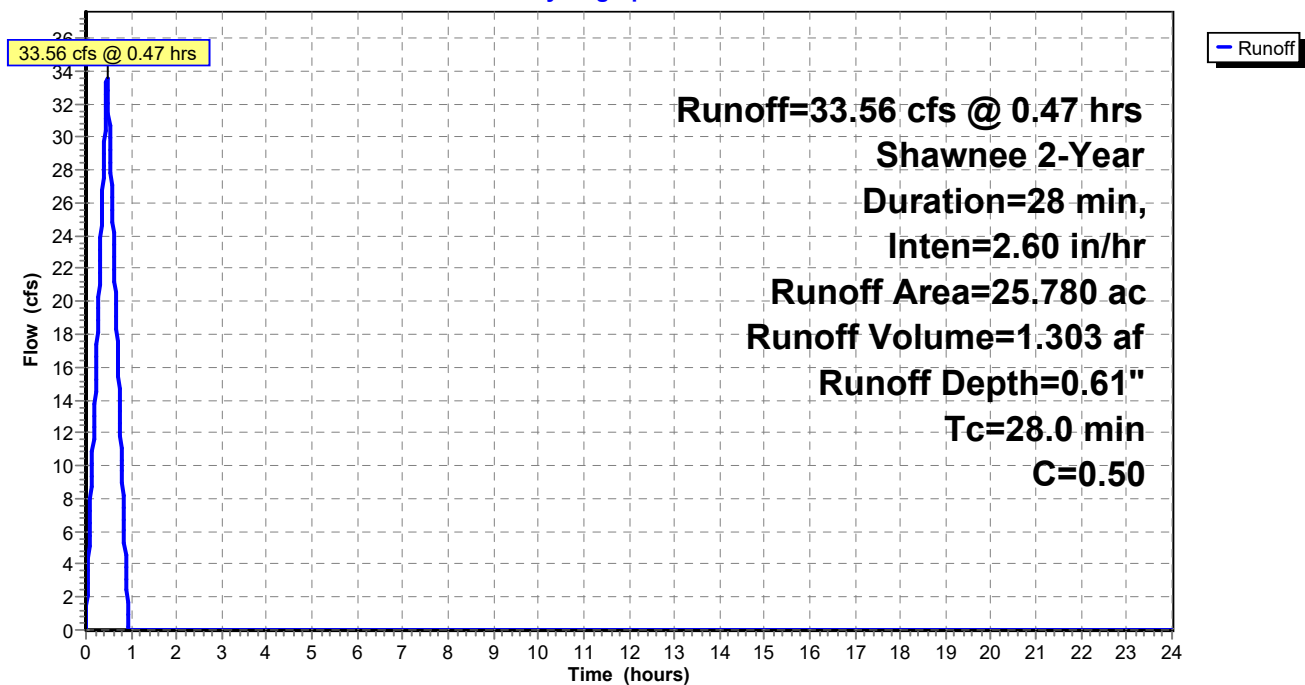
Runoff by Rational method, Rise/Fall=1.0/1.0 xTc, Time Span= 0.00-24.00 hrs, dt= 0.01 hrs
 Shawnee 2-Year Duration=28 min, Inten=2.60 in/hr

Area (ac)	C	Description
25.780	0.50	GRASS
25.780		Pervious Area

Tc (min)	Length (feet)	Slope (ft/ft)	Velocity (ft/sec)	Capacity (cfs)	Description
28.0					Direct Entry,

Subcatchment 1S: Pre Dev Drainage Area DA1

Hydrograph



PRE DEVELOPMENT DRAINAGE AREA DA1

Shawnee 5-Year Duration=28 min, Inten=3.39 in/hr

Prepared by LANDES ENGINEERING LLC

HydroCAD® 8.50 s/n 002876 © 2007 HydroCAD Software Solutions LLC

Page 4

Summary for Subcatchment 1S: Pre Dev Drainage Area DA1

Runoff = 43.75 cfs @ 0.47 hrs, Volume= 1.698 af, Depth= 0.79"

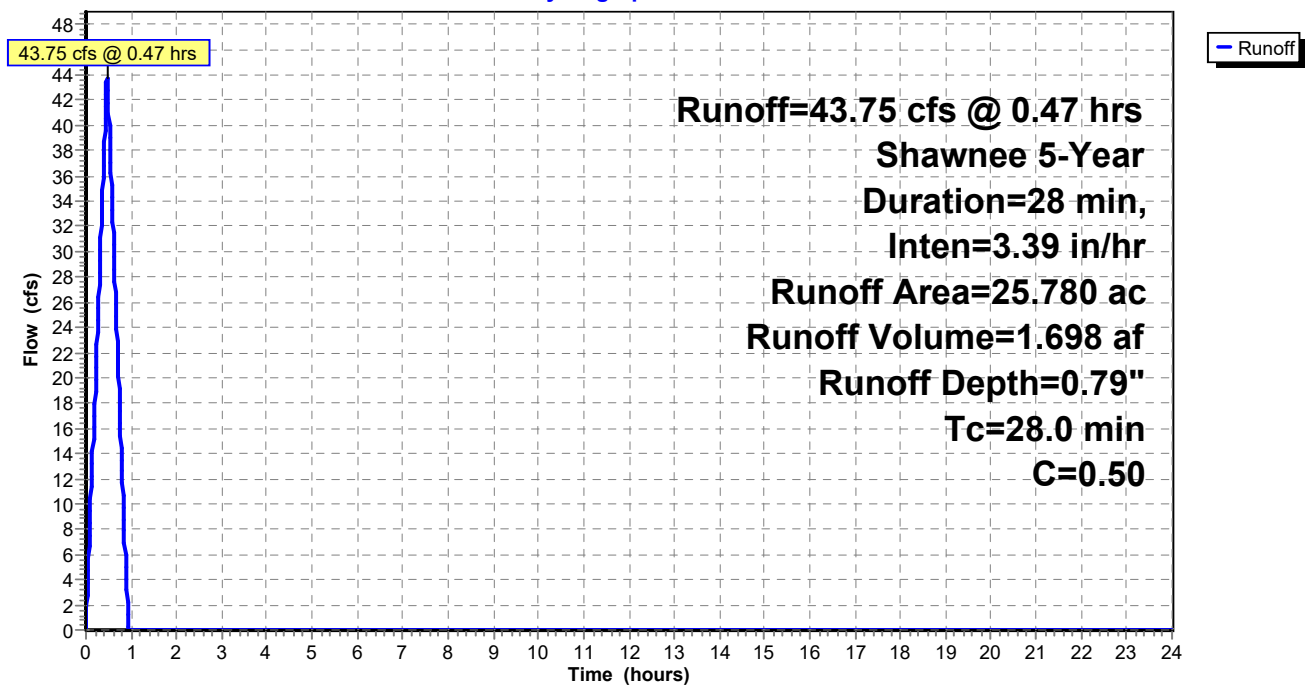
Runoff by Rational method, Rise/Fall=1.0/1.0 xTc, Time Span= 0.00-24.00 hrs, dt= 0.01 hrs
Shawnee 5-Year Duration=28 min, Inten=3.39 in/hr

Area (ac)	C	Description
25.780	0.50	GRASS
25.780		Pervious Area

Tc (min)	Length (feet)	Slope (ft/ft)	Velocity (ft/sec)	Capacity (cfs)	Description
28.0					Direct Entry,

Subcatchment 1S: Pre Dev Drainage Area DA1

Hydrograph



PRE DEVELOPMENT DRAINAGE AREA DA1

Shawnee 10-Year Duration=28 min, Inten=3.88 in/hr

Prepared by LANDES ENGINEERING LLC

HydroCAD® 8.50 s/n 002876 © 2007 HydroCAD Software Solutions LLC

Page 5

Summary for Subcatchment 1S: Pre Dev Drainage Area DA1

Runoff = 50.16 cfs @ 0.47 hrs, Volume= 1.947 af, Depth= 0.91"

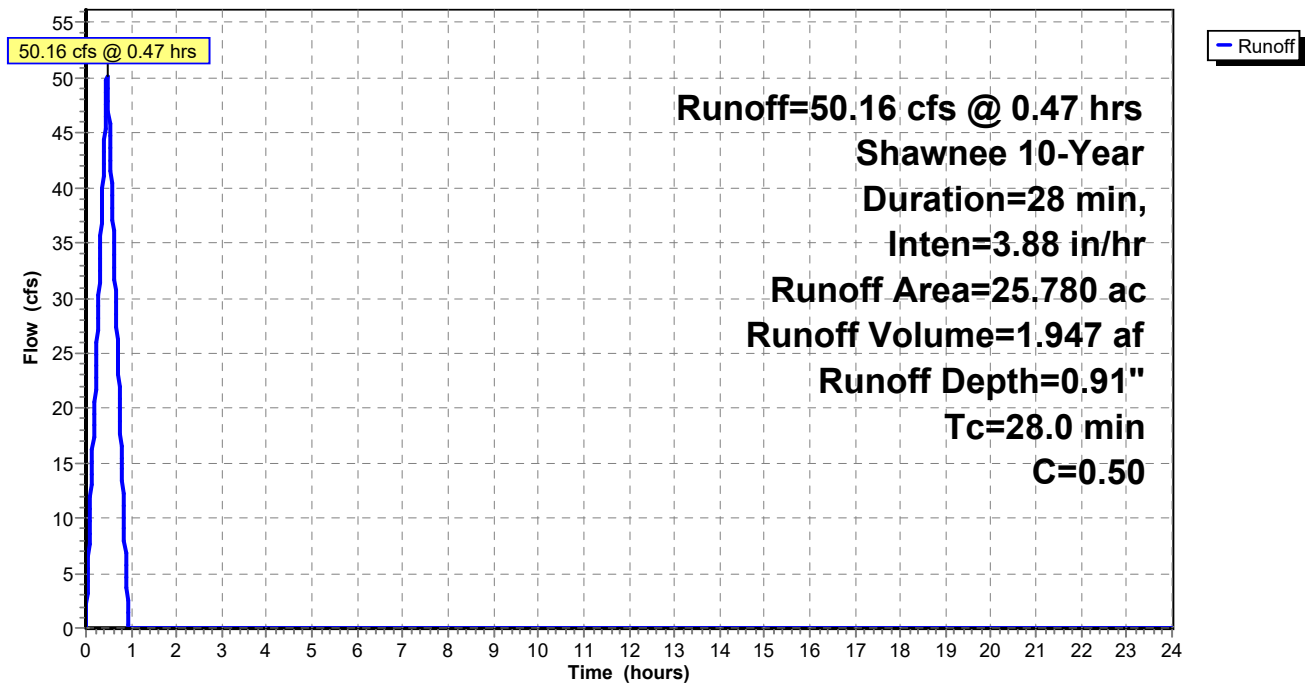
Runoff by Rational method, Rise/Fall=1.0/1.0 xTc, Time Span= 0.00-24.00 hrs, dt= 0.01 hrs
Shawnee 10-Year Duration=28 min, Inten=3.88 in/hr

Area (ac)	C	Description
25.780	0.50	GRASS
25.780		Pervious Area

Tc (min)	Length (feet)	Slope (ft/ft)	Velocity (ft/sec)	Capacity (cfs)	Description
28.0					Direct Entry,

Subcatchment 1S: Pre Dev Drainage Area DA1

Hydrograph



PRE DEVELOPMENT DRAINAGE AREA DA1

Shawnee 25-Year Duration=28 min, Inten=4.56 in/hr

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Summary for Subcatchment 1S: Pre Dev Drainage Area DA1

Runoff = 58.89 cfs @ 0.47 hrs, Volume= 2.285 af, Depth= 1.06"

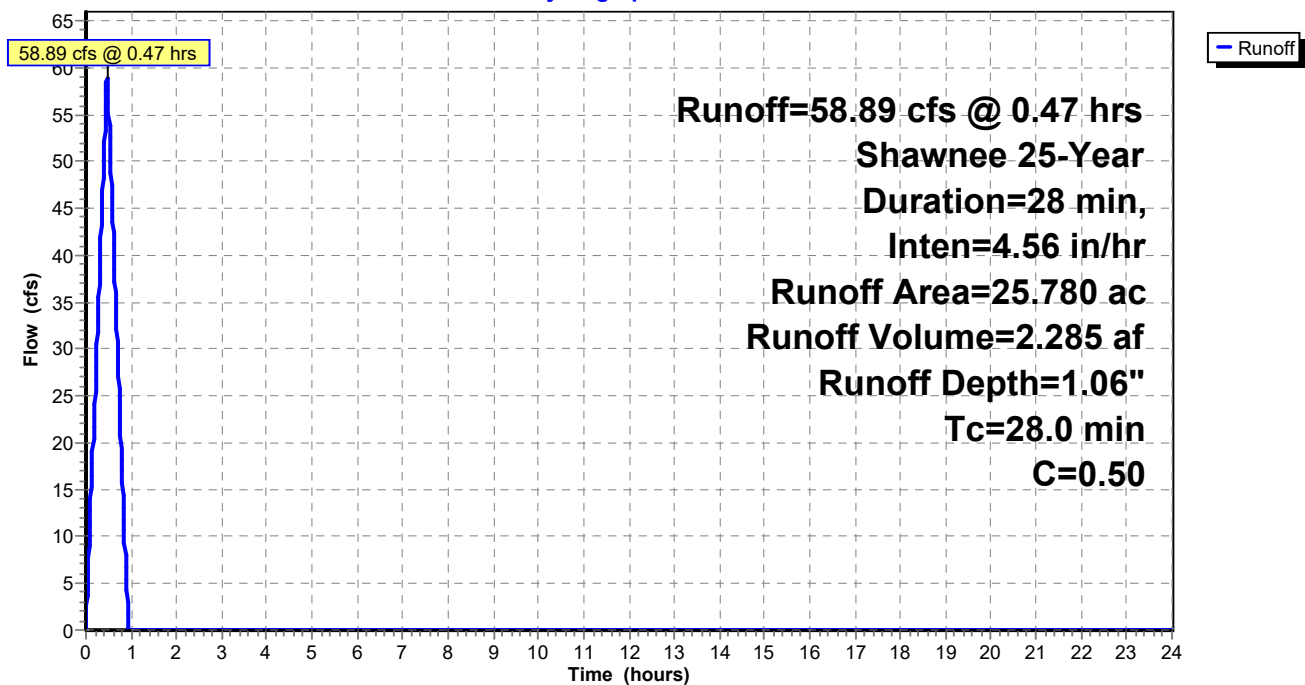
Runoff by Rational method, Rise/Fall=1.0/1.0 xTc, Time Span= 0.00-24.00 hrs, dt= 0.01 hrs
Shawnee 25-Year Duration=28 min, Inten=4.56 in/hr

Area (ac)	C	Description
25.780	0.50	GRASS
25.780		Pervious Area

Tc (min)	Length (feet)	Slope (ft/ft)	Velocity (ft/sec)	Capacity (cfs)	Description
28.0					Direct Entry,

Subcatchment 1S: Pre Dev Drainage Area DA1

Hydrograph



PRE DEVELOPMENT DRAINAGE AREA DA1

Shawnee 50-Year Duration=28 min, Inten=5.23 in/hr

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Summary for Subcatchment 1S: Pre Dev Drainage Area DA1

Runoff = 67.56 cfs @ 0.47 hrs, Volume= 2.622 af, Depth= 1.22"

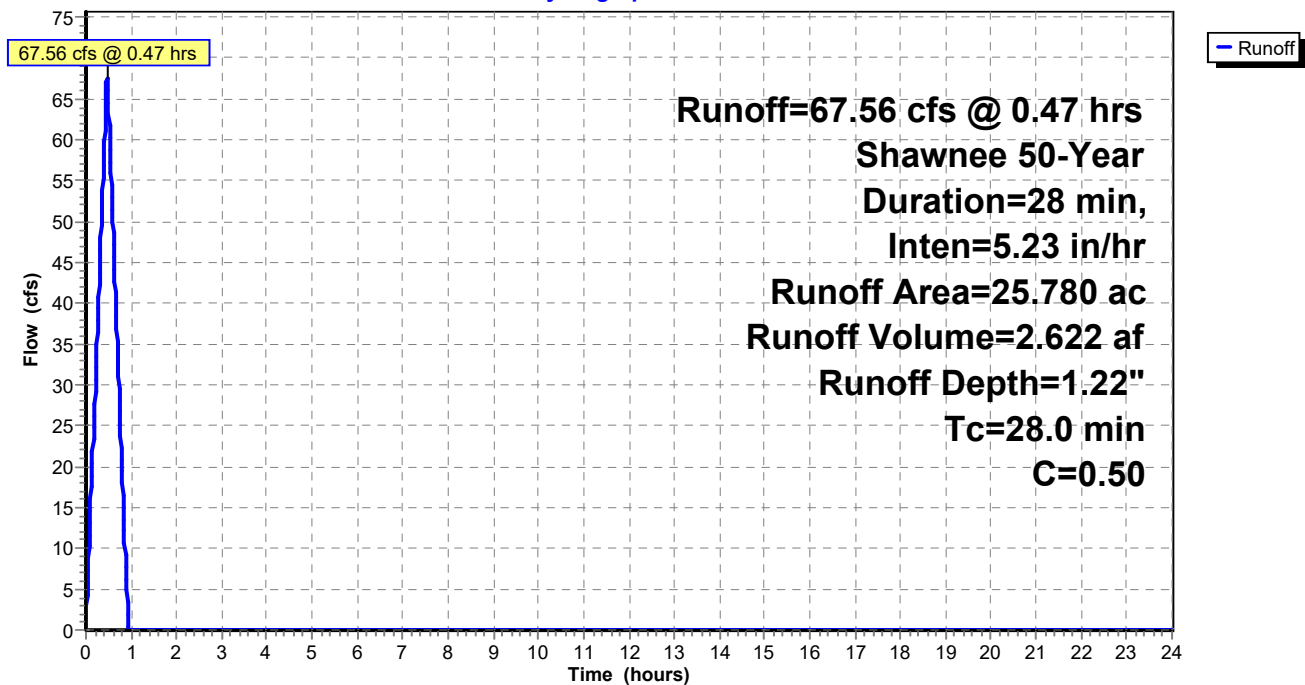
Runoff by Rational method, Rise/Fall=1.0/1.0 xTc, Time Span= 0.00-24.00 hrs, dt= 0.01 hrs
Shawnee 50-Year Duration=28 min, Inten=5.23 in/hr

Area (ac)	C	Description
25.780	0.50	GRASS
25.780		Pervious Area

Tc (min)	Length (feet)	Slope (ft/ft)	Velocity (ft/sec)	Capacity (cfs)	Description
28.0					Direct Entry,

Subcatchment 1S: Pre Dev Drainage Area DA1

Hydrograph



PRE DEVELOPMENT DRAINAGE AREA DA1

Shawnee 100-Year Duration=28 min, Inten=5.72 in/hr

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Summary for Subcatchment 1S: Pre Dev Drainage Area DA1

Runoff = 73.93 cfs @ 0.47 hrs, Volume= 2.869 af, Depth= 1.34"

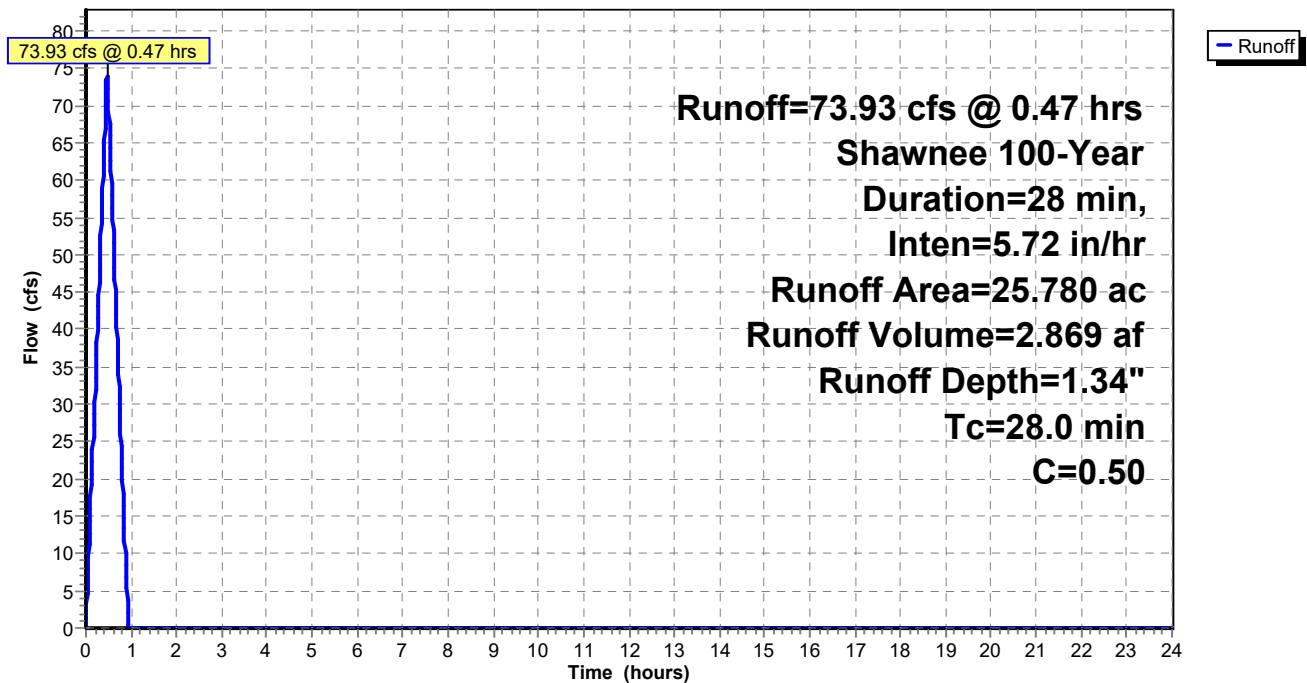
Runoff by Rational method, Rise/Fall=1.0/1.0 xTc, Time Span= 0.00-24.00 hrs, dt= 0.01 hrs
Shawnee 100-Year Duration=28 min, Inten=5.72 in/hr

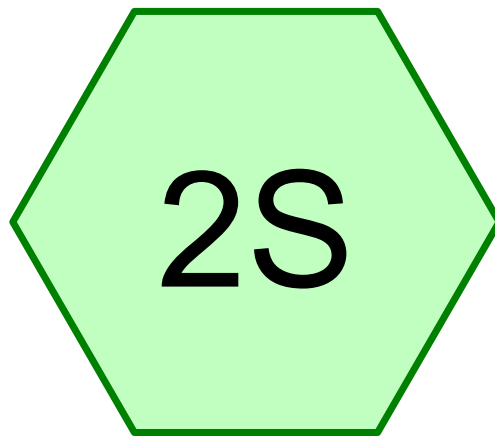
Area (ac)	C	Description
25.780	0.50	GRASS
25.780		Pervious Area

Tc (min)	Length (feet)	Slope (ft/ft)	Velocity (ft/sec)	Capacity (cfs)	Description
28.0					Direct Entry,

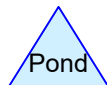
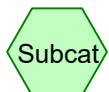
Subcatchment 1S: Pre Dev Drainage Area DA1

Hydrograph





Pre Dev Drainage Area-DA2



Drainage Diagram for PRE DEVELOPMENT DRAINAGE AREA DA2
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PRE DEVELOPMENT DRAINAGE AREA DA2

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Area Listing (all nodes)

Area (acres)	C	Description (subcatchment-numbers)
4.390	0.50	GRASS (2S)

Summary for Subcatchment 2S: Pre Dev Drainage Area-DA2

Runoff = 6.87 cfs @ 0.33 hrs, Volume= 0.191 af, Depth= 0.52"

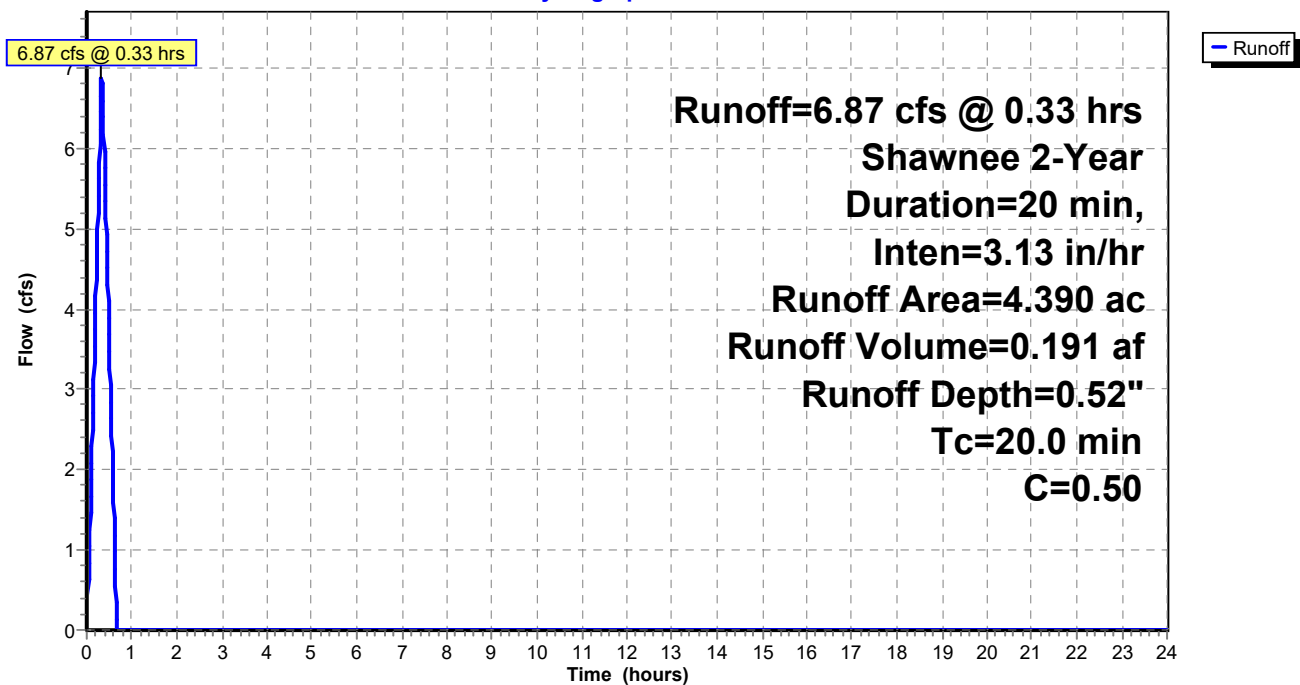
Runoff by Rational method, Rise/Fall=1.0/1.0 xTc, Time Span= 0.00-24.00 hrs, dt= 0.01 hrs
Shawnee 2-Year Duration=20 min, Inten=3.13 in/hr

Area (ac)	C	Description
4.390	0.50	GRASS
4.390		Pervious Area

Tc (min)	Length (feet)	Slope (ft/ft)	Velocity (ft/sec)	Capacity (cfs)	Description
20.0					Direct Entry,

Subcatchment 2S: Pre Dev Drainage Area-DA2

Hydrograph



PRE DEVELOPMENT DRAINAGE AREA DA2

Shawnee 5-Year Duration=20 min, Inten=4.05 in/hr

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Summary for Subcatchment 2S: Pre Dev Drainage Area-DA2

Runoff = 8.89 cfs @ 0.33 hrs, Volume= 0.247 af, Depth= 0.68"

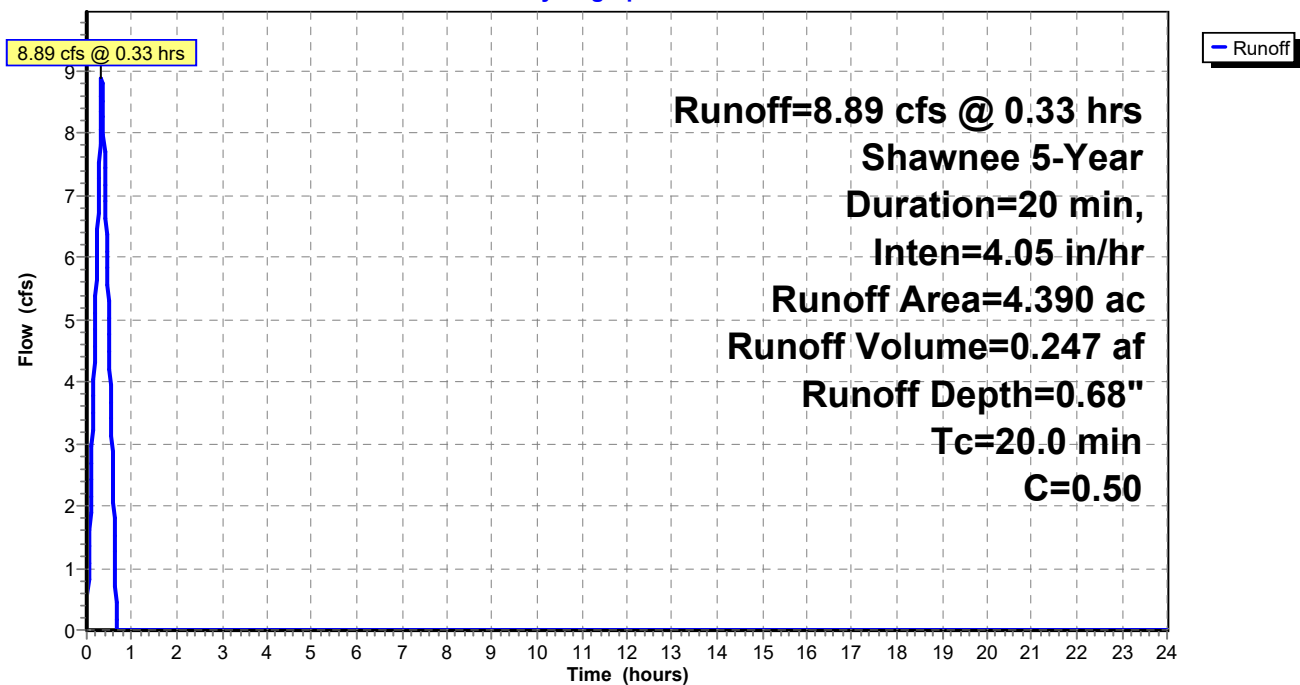
Runoff by Rational method, Rise/Fall=1.0/1.0 xTc, Time Span= 0.00-24.00 hrs, dt= 0.01 hrs
Shawnee 5-Year Duration=20 min, Inten=4.05 in/hr

Area (ac)	C	Description
4.390	0.50	GRASS
4.390		Pervious Area

Tc (min)	Length (feet)	Slope (ft/ft)	Velocity (ft/sec)	Capacity (cfs)	Description
20.0					Direct Entry,

Subcatchment 2S: Pre Dev Drainage Area-DA2

Hydrograph



Summary for Subcatchment 2S: Pre Dev Drainage Area-DA2

Runoff = 10.14 cfs @ 0.33 hrs, Volume= 0.282 af, Depth= 0.77"

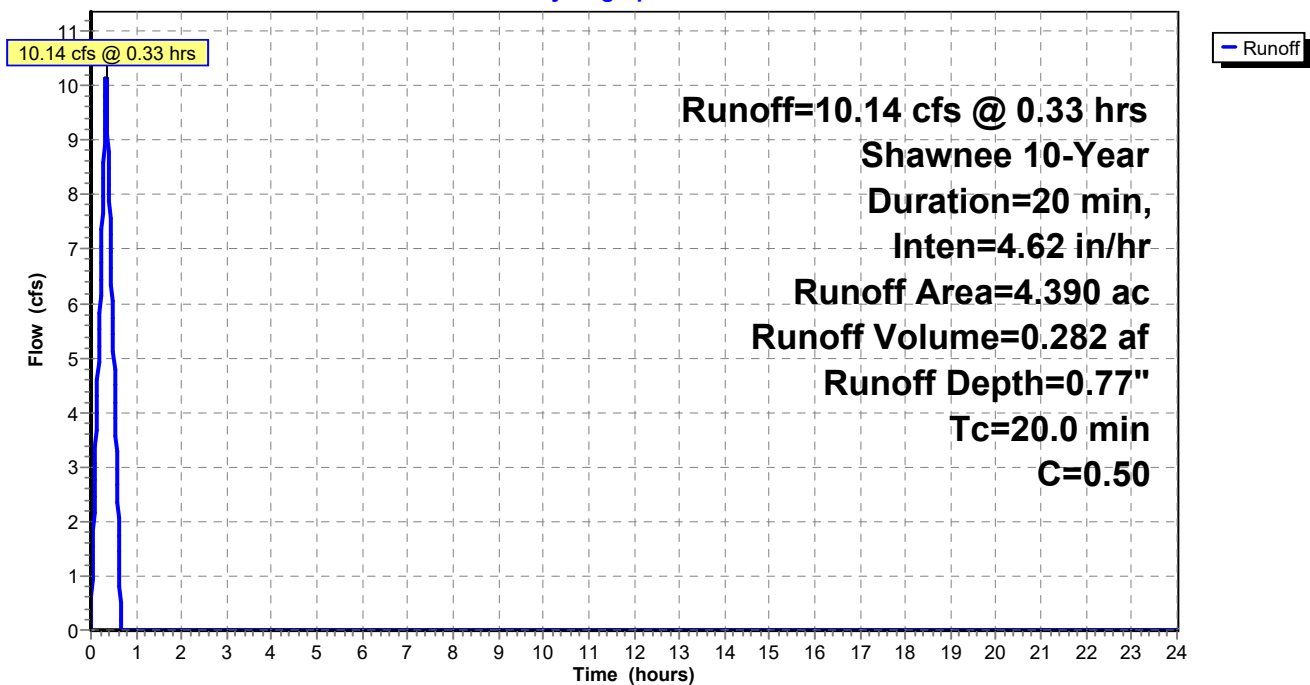
Runoff by Rational method, Rise/Fall=1.0/1.0 xTc, Time Span= 0.00-24.00 hrs, dt= 0.01 hrs
 Shawnee 10-Year Duration=20 min, Inten=4.62 in/hr

Area (ac)	C	Description
4.390	0.50	GRASS
4.390		Pervious Area

Tc (min)	Length (feet)	Slope (ft/ft)	Velocity (ft/sec)	Capacity (cfs)	Description
20.0					Direct Entry,

Subcatchment 2S: Pre Dev Drainage Area-DA2

Hydrograph



Summary for Subcatchment 2S: Pre Dev Drainage Area-DA2

Runoff = 11.90 cfs @ 0.33 hrs, Volume= 0.331 af, Depth= 0.90"

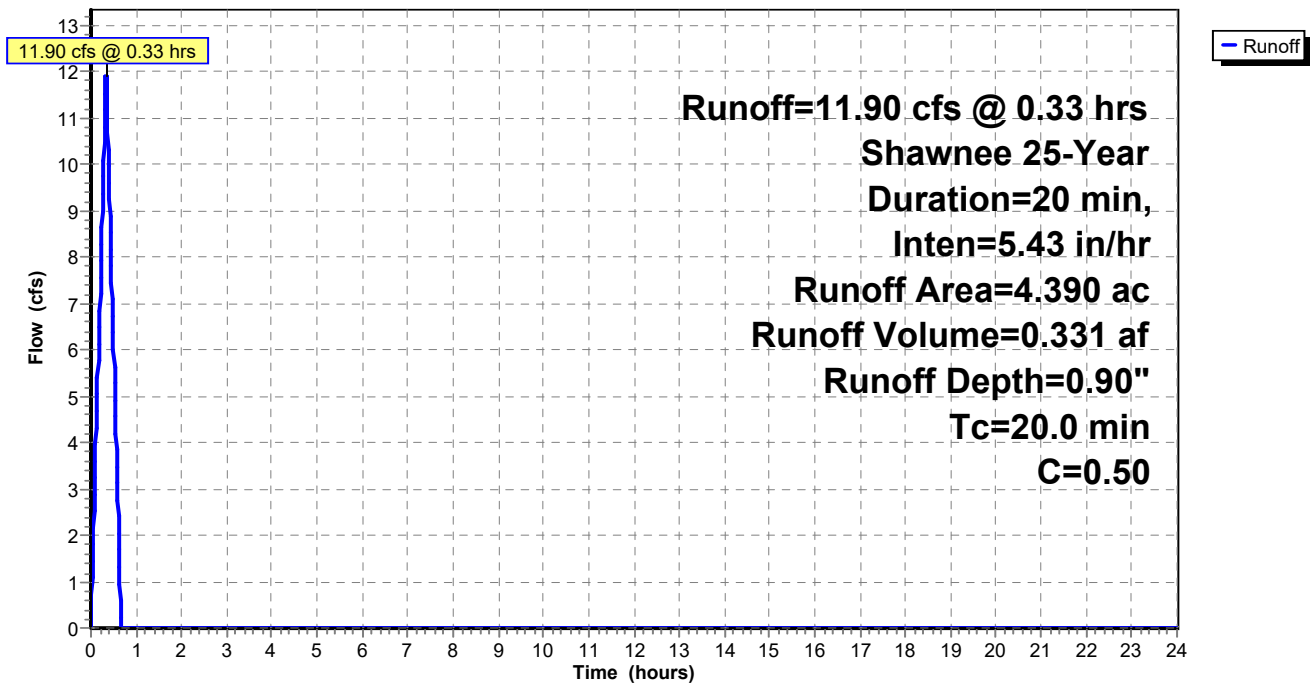
Runoff by Rational method, Rise/Fall=1.0/1.0 xTc, Time Span= 0.00-24.00 hrs, dt= 0.01 hrs
 Shawnee 25-Year Duration=20 min, Inten=5.43 in/hr

Area (ac)	C	Description
4.390	0.50	GRASS
4.390		Pervious Area

Tc (min)	Length (feet)	Slope (ft/ft)	Velocity (ft/sec)	Capacity (cfs)	Description
20.0					Direct Entry,

Subcatchment 2S: Pre Dev Drainage Area-DA2

Hydrograph



PRE DEVELOPMENT DRAINAGE AREA DA2

Shawnee 50-Year Duration=20 min, Inten=6.17 in/hr

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Summary for Subcatchment 2S: Pre Dev Drainage Area-DA2

Runoff = 13.53 cfs @ 0.33 hrs, Volume= 0.376 af, Depth= 1.03"

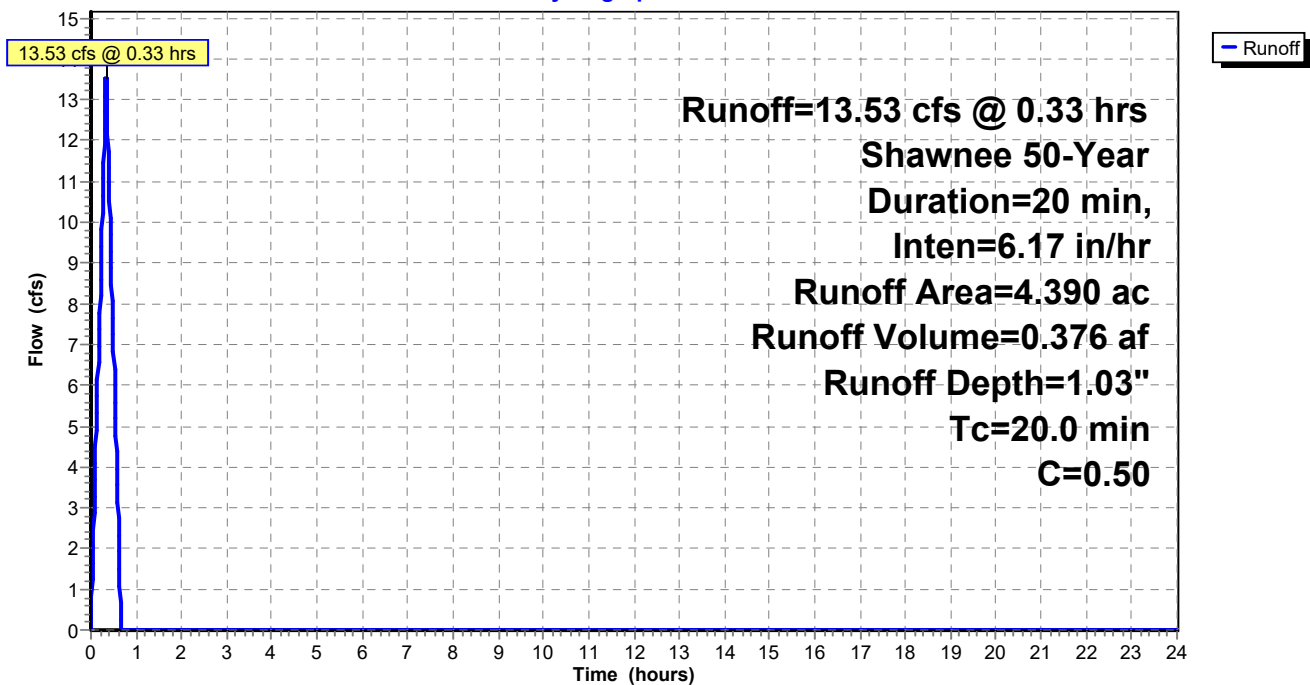
Runoff by Rational method, Rise/Fall=1.0/1.0 xTc, Time Span= 0.00-24.00 hrs, dt= 0.01 hrs
Shawnee 50-Year Duration=20 min, Inten=6.17 in/hr

Area (ac)	C	Description
4.390	0.50	GRASS
4.390		Pervious Area

Tc (min)	Length (feet)	Slope (ft/ft)	Velocity (ft/sec)	Capacity (cfs)	Description
20.0					Direct Entry,

Subcatchment 2S: Pre Dev Drainage Area-DA2

Hydrograph



Summary for Subcatchment 2S: Pre Dev Drainage Area-DA2

Runoff = 14.81 cfs @ 0.33 hrs, Volume= 0.411 af, Depth= 1.12"

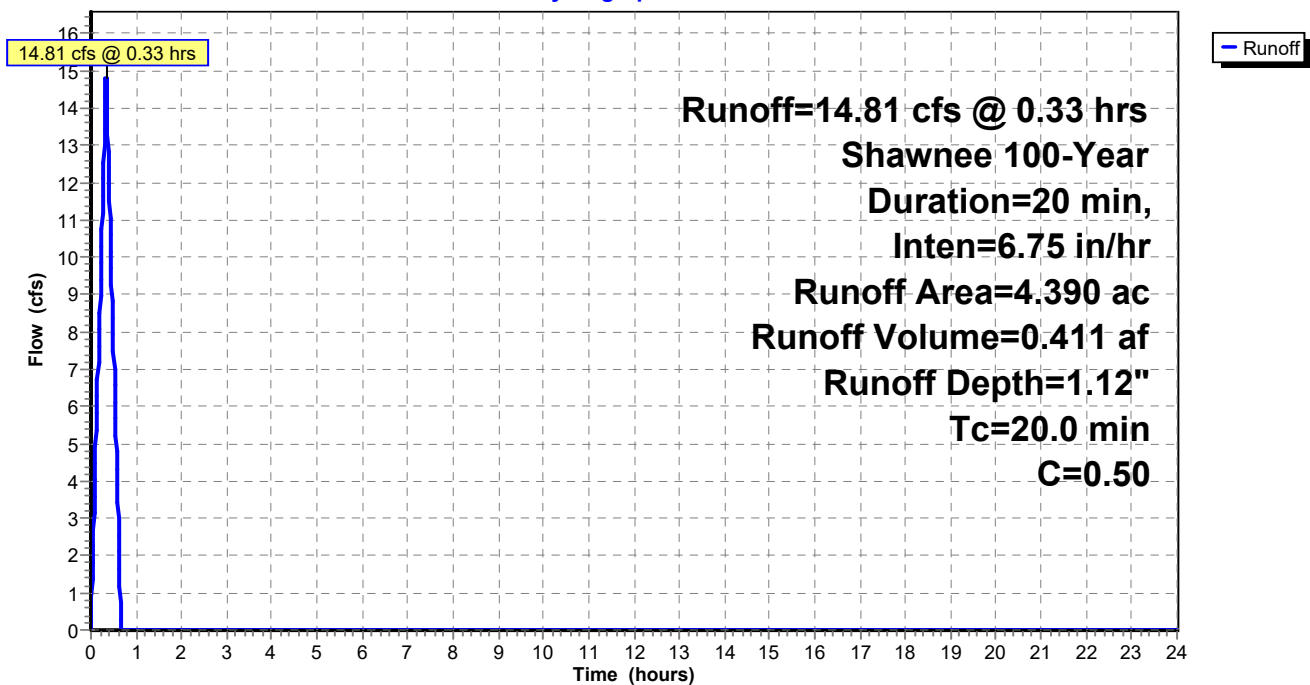
Runoff by Rational method, Rise/Fall=1.0/1.0 xTc, Time Span= 0.00-24.00 hrs, dt= 0.01 hrs
 Shawnee 100-Year Duration=20 min, Inten=6.75 in/hr

Area (ac)	C	Description
4.390	0.50	GRASS
4.390		Pervious Area

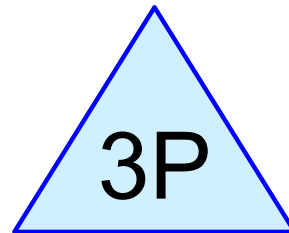
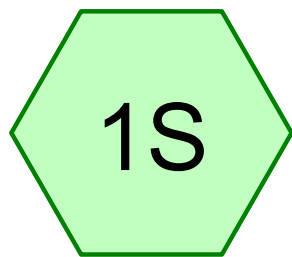
Tc (min)	Length (feet)	Slope (ft/ft)	Velocity (ft/sec)	Capacity (cfs)	Description
20.0					Direct Entry,

Subcatchment 2S: Pre Dev Drainage Area-DA2

Hydrograph

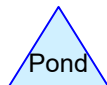
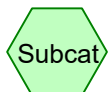


APPENDIX C: POST-DEVELOPMENT HYDROLOGY AND HYDRAULICS



Post-Dev Drainage Area
DA1

(new Pond)



Post DEVELOPMENT DRAINAGE AREA DA1

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Area Listing (all nodes)

Area (acres)	C	Description (subcatchment-numbers)
23.600	0.70	GRASS (1S)

Summary for Subcatchment 1S: Post-Dev Drainage Area DA1

Runoff = 57.78 cfs @ 0.27 hrs, Volume= 1.287 af, Depth= 0.65"

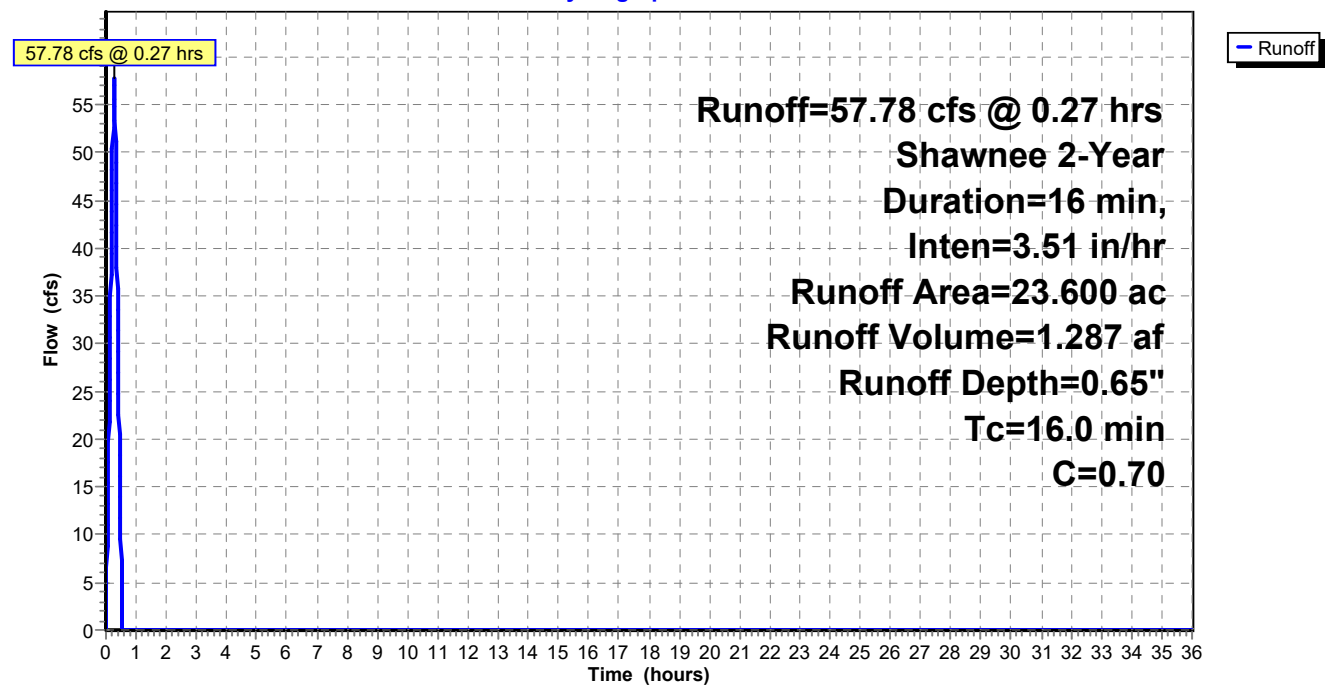
Runoff by Rational method, Rise/Fall=1.0/1.0 xTc, Time Span= 0.00-36.00 hrs, dt= 0.01 hrs
 Shawnee 2-Year Duration=16 min, Inten=3.51 in/hr

Area (ac)	C	Description
23.600	0.70	GRASS
23.600		Pervious Area

Tc (min)	Length (feet)	Slope (ft/ft)	Velocity (ft/sec)	Capacity (cfs)	Description
16.0					Direct Entry,

Subcatchment 1S: Post-Dev Drainage Area DA1

Hydrograph



Hydrograph for Subcatchment 1S: Post-Dev Drainage Area DA1

Time (hours)	Runoff (cfs)	Time (hours)	Runoff (cfs)	Time (hours)	Runoff (cfs)	Time (hours)	Runoff (cfs)
0.00	0.00	10.20	0.00	20.40	0.00	30.60	0.00
0.20	43.81	10.40	0.00	20.60	0.00	30.80	0.00
0.40	29.21	10.60	0.00	20.80	0.00	31.00	0.00
0.60	0.00	10.80	0.00	21.00	0.00	31.20	0.00
0.80	0.00	11.00	0.00	21.20	0.00	31.40	0.00
1.00	0.00	11.20	0.00	21.40	0.00	31.60	0.00
1.20	0.00	11.40	0.00	21.60	0.00	31.80	0.00
1.40	0.00	11.60	0.00	21.80	0.00	32.00	0.00
1.60	0.00	11.80	0.00	22.00	0.00	32.20	0.00
1.80	0.00	12.00	0.00	22.20	0.00	32.40	0.00
2.00	0.00	12.20	0.00	22.40	0.00	32.60	0.00
2.20	0.00	12.40	0.00	22.60	0.00	32.80	0.00
2.40	0.00	12.60	0.00	22.80	0.00	33.00	0.00
2.60	0.00	12.80	0.00	23.00	0.00	33.20	0.00
2.80	0.00	13.00	0.00	23.20	0.00	33.40	0.00
3.00	0.00	13.20	0.00	23.40	0.00	33.60	0.00
3.20	0.00	13.40	0.00	23.60	0.00	33.80	0.00
3.40	0.00	13.60	0.00	23.80	0.00	34.00	0.00
3.60	0.00	13.80	0.00	24.00	0.00	34.20	0.00
3.80	0.00	14.00	0.00	24.20	0.00	34.40	0.00
4.00	0.00	14.20	0.00	24.40	0.00	34.60	0.00
4.20	0.00	14.40	0.00	24.60	0.00	34.80	0.00
4.40	0.00	14.60	0.00	24.80	0.00	35.00	0.00
4.60	0.00	14.80	0.00	25.00	0.00	35.20	0.00
4.80	0.00	15.00	0.00	25.20	0.00	35.40	0.00
5.00	0.00	15.20	0.00	25.40	0.00	35.60	0.00
5.20	0.00	15.40	0.00	25.60	0.00	35.80	0.00
5.40	0.00	15.60	0.00	25.80	0.00	36.00	0.00
5.60	0.00	15.80	0.00	26.00	0.00		
5.80	0.00	16.00	0.00	26.20	0.00		
6.00	0.00	16.20	0.00	26.40	0.00		
6.20	0.00	16.40	0.00	26.60	0.00		
6.40	0.00	16.60	0.00	26.80	0.00		
6.60	0.00	16.80	0.00	27.00	0.00		
6.80	0.00	17.00	0.00	27.20	0.00		
7.00	0.00	17.20	0.00	27.40	0.00		
7.20	0.00	17.40	0.00	27.60	0.00		
7.40	0.00	17.60	0.00	27.80	0.00		
7.60	0.00	17.80	0.00	28.00	0.00		
7.80	0.00	18.00	0.00	28.20	0.00		
8.00	0.00	18.20	0.00	28.40	0.00		
8.20	0.00	18.40	0.00	28.60	0.00		
8.40	0.00	18.60	0.00	28.80	0.00		
8.60	0.00	18.80	0.00	29.00	0.00		
8.80	0.00	19.00	0.00	29.20	0.00		
9.00	0.00	19.20	0.00	29.40	0.00		
9.20	0.00	19.40	0.00	29.60	0.00		
9.40	0.00	19.60	0.00	29.80	0.00		
9.60	0.00	19.80	0.00	30.00	0.00		
9.80	0.00	20.00	0.00	30.20	0.00		
10.00	0.00	20.20	0.00	30.40	0.00		

Summary for Pond 3P: (new Pond)

Inflow Area = 23.600 ac, 0.00% Impervious, Inflow Depth = 0.65" for 2-Year event
 Inflow = 57.78 cfs @ 0.27 hrs, Volume= 1.287 af
 Outflow = 24.64 cfs @ 0.42 hrs, Volume= 1.287 af, Atten= 57% Lag= 9.2 min
 Primary = 24.64 cfs @ 0.42 hrs, Volume= 1.287 af

Routing by Stor-Ind method, Time Span= 0.00-36.00 hrs, dt= 0.01 hrs
 Peak Elev= 990.30' @ 0.42 hrs Surf.Area= 15,227 sf Storage= 27,707 cf

Plug-Flow detention time= 13.2 min calculated for 1.287 af (100% of inflow)
 Center-of-Mass det. time= 13.2 min (29.2 - 16.0)

Volume	Invert	Avail.Storage	Storage Description
#1	988.00'	123,172 cf	Custom Stage Data (Irregular) Listed below (Recalc)

Elevation (feet)	Surf.Area (sq-ft)	Perim. (feet)	Inc.Store (cubic-feet)	Cum.Store (cubic-feet)	Wet.Area (sq-ft)
988.00	7,354	425.0	0	0	7,354
989.00	12,425	660.5	9,779	9,779	27,704
990.00	14,533	669.0	13,465	23,245	28,822
991.00	16,909	681.0	15,706	38,951	30,278
992.00	18,873	693.0	17,882	56,833	31,759
993.00	20,959	717.0	19,907	76,739	34,542
994.00	23,154	738.0	22,047	98,787	37,080
995.00	25,637	765.0	24,385	123,172	40,396

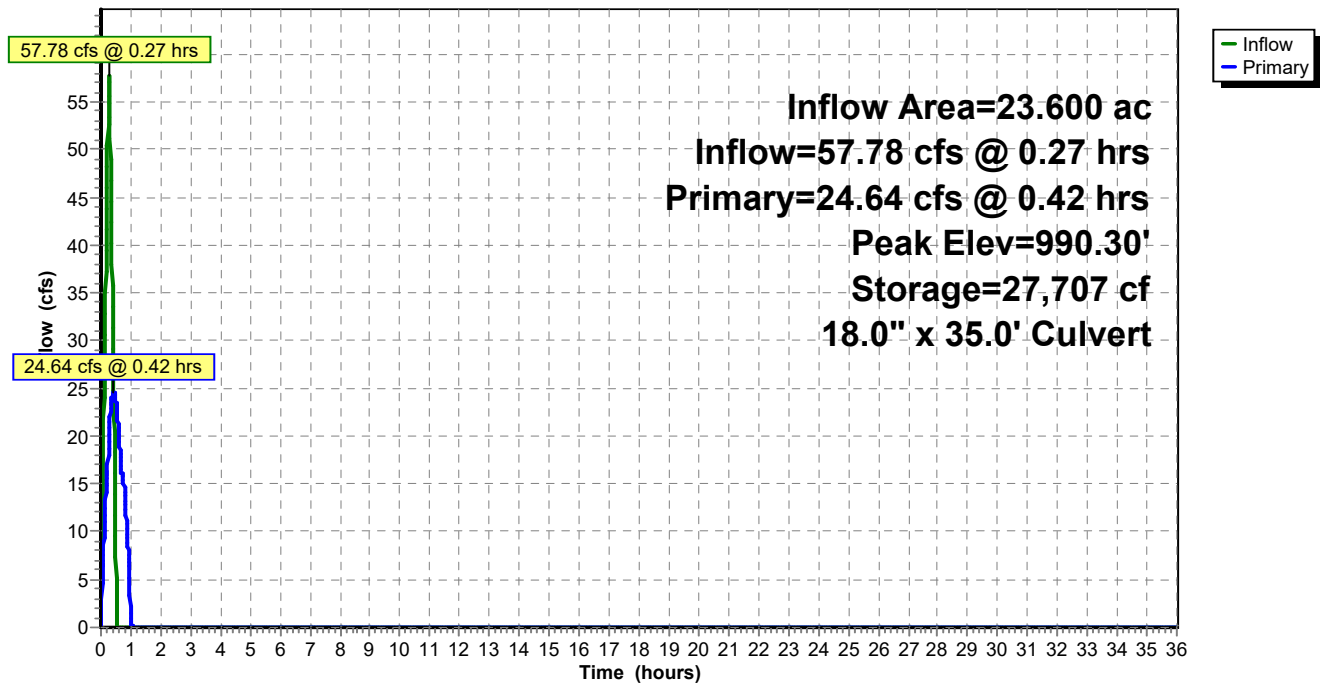
Device	Routing	Invert	Outlet Devices
#1	Primary	987.10'	18.0" x 35.0' long Culvert X 2.00 Box, 30-75° wingwalls, rounded crown, Ke= 0.200 Outlet Invert= 986.75' S= 0.0100 '/' Cc= 0.900 n= 0.020 Corrugated PE, corrugated interior

Primary OutFlow Max=24.64 cfs @ 0.42 hrs HW=990.30' (Free Discharge)

↑ **1=Culvert** (Barrel Controls 24.64 cfs @ 6.97 fps)

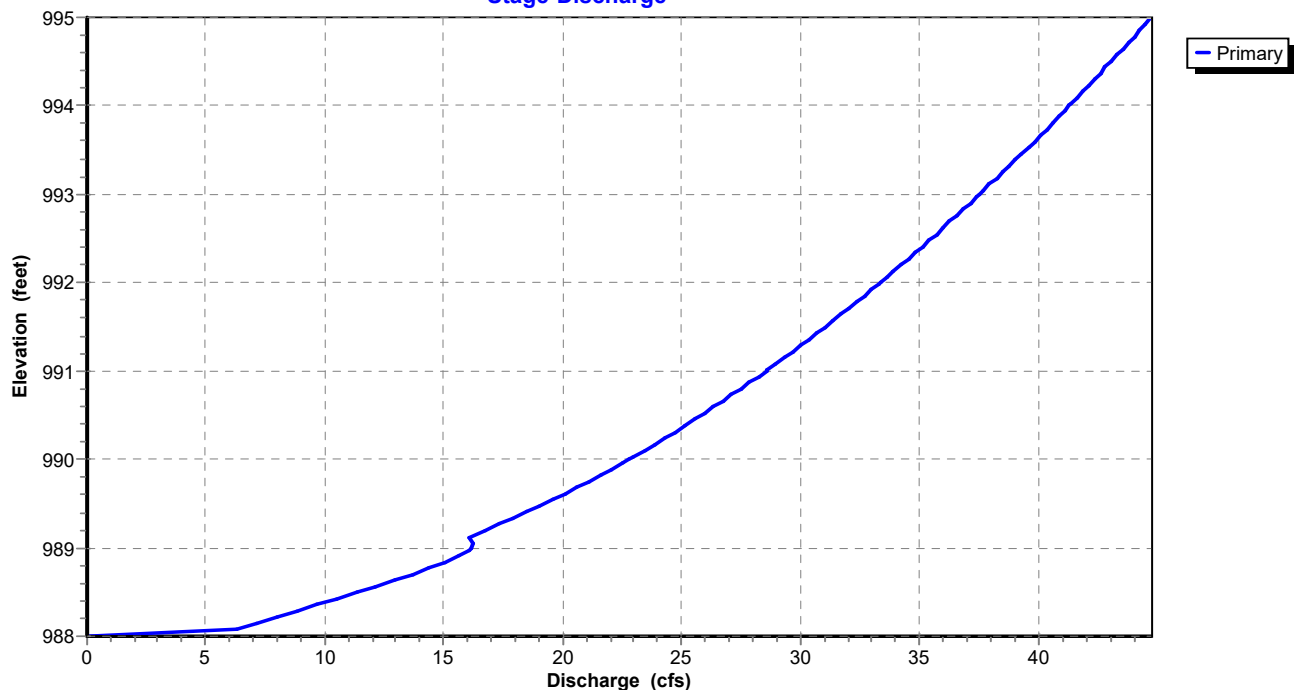
Pond 3P: (new Pond)

Hydrograph



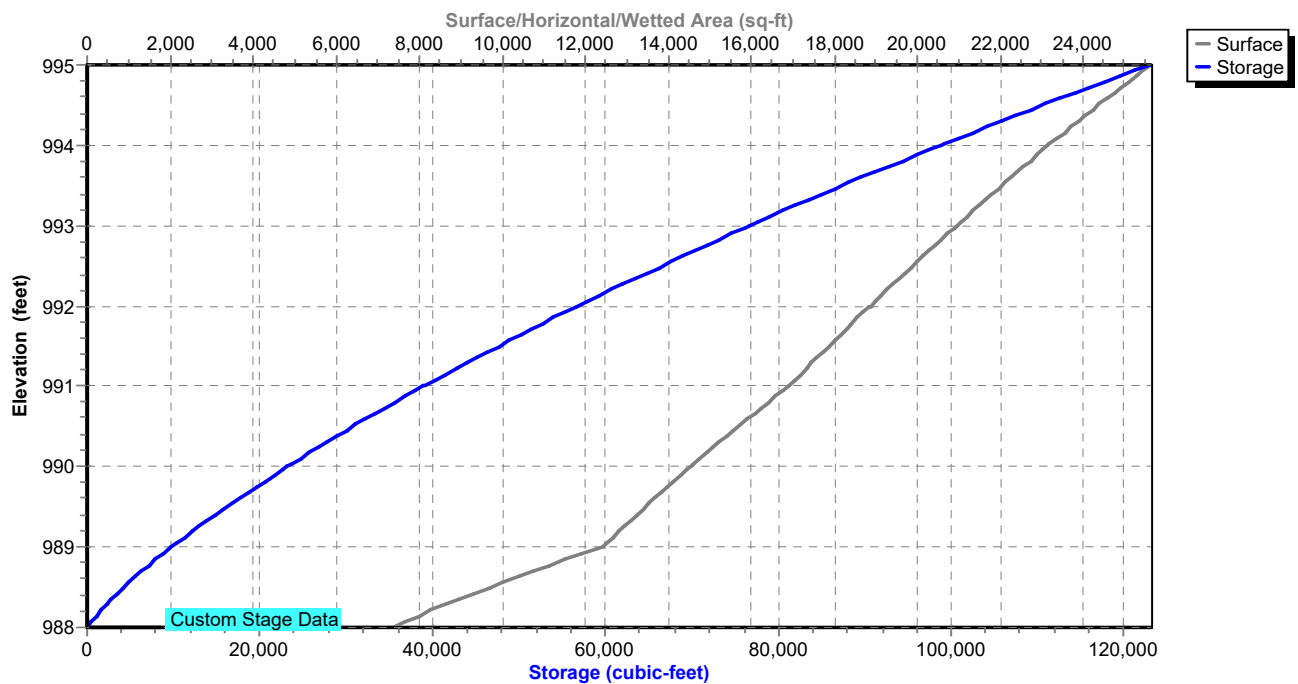
Pond 3P: (new Pond)

Stage-Discharge



Pond 3P: (new Pond)

Stage-Area-Storage



Hydrograph for Pond 3P: (new Pond)

Time (hours)	Inflow (cfs)	Storage (cubic-feet)	Elevation (feet)	Primary (cfs)
0.00	0.00	0	988.00	0.00
1.00	0.00	74	988.01	0.90
2.00	0.00	0	988.00	0.00
3.00	0.00	0	988.00	0.00
4.00	0.00	0	988.00	0.00
5.00	0.00	0	988.00	0.00
6.00	0.00	0	988.00	0.00
7.00	0.00	0	988.00	0.00
8.00	0.00	0	988.00	0.00
9.00	0.00	0	988.00	0.00
10.00	0.00	0	988.00	0.00
11.00	0.00	0	988.00	0.00
12.00	0.00	0	988.00	0.00
13.00	0.00	0	988.00	0.00
14.00	0.00	0	988.00	0.00
15.00	0.00	0	988.00	0.00
16.00	0.00	0	988.00	0.00
17.00	0.00	0	988.00	0.00
18.00	0.00	0	988.00	0.00
19.00	0.00	0	988.00	0.00
20.00	0.00	0	988.00	0.00
21.00	0.00	0	988.00	0.00
22.00	0.00	0	988.00	0.00
23.00	0.00	0	988.00	0.00
24.00	0.00	0	988.00	0.00
25.00	0.00	0	988.00	0.00
26.00	0.00	0	988.00	0.00
27.00	0.00	0	988.00	0.00
28.00	0.00	0	988.00	0.00
29.00	0.00	0	988.00	0.00
30.00	0.00	0	988.00	0.00
31.00	0.00	0	988.00	0.00
32.00	0.00	0	988.00	0.00
33.00	0.00	0	988.00	0.00
34.00	0.00	0	988.00	0.00
35.00	0.00	0	988.00	0.00
36.00	0.00	0	988.00	0.00

Stage-Discharge for Pond 3P: (new Pond)

Elevation (feet)	Primary (cfs)	Elevation (feet)	Primary (cfs)	Elevation (feet)	Primary (cfs)	Elevation (feet)	Primary (cfs)
988.00	0.00	990.04	23.03	992.08	33.69	994.12	41.70
988.04	5.99	990.08	23.29	992.12	33.86	994.16	41.85
988.08	6.44	990.12	23.54	992.16	34.04	994.20	41.99
988.12	6.90	990.16	23.79	992.20	34.21	994.24	42.13
988.16	7.36	990.20	24.04	992.24	34.38	994.28	42.27
988.20	7.83	990.24	24.28	992.28	34.56	994.32	42.41
988.24	8.31	990.28	24.53	992.32	34.73	994.36	42.55
988.28	8.79	990.32	24.77	992.36	34.90	994.40	42.69
988.32	9.27	990.36	25.00	992.40	35.07	994.44	42.83
988.36	9.75	990.40	25.24	992.44	35.23	994.48	42.96
988.40	10.24	990.44	25.47	992.48	35.40	994.52	43.10
988.44	10.72	990.48	25.70	992.52	35.57	994.56	43.24
988.48	11.20	990.52	25.93	992.56	35.74	994.60	43.38
988.52	11.67	990.56	26.16	992.60	35.90	994.64	43.51
988.56	12.14	990.60	26.39	992.64	36.07	994.68	43.65
988.60	12.60	990.64	26.61	992.68	36.23	994.72	43.78
988.64	13.04	990.68	26.83	992.72	36.39	994.76	43.92
988.68	13.48	990.72	27.05	992.76	36.56	994.80	44.05
988.72	13.90	990.76	27.27	992.80	36.72	994.84	44.19
988.76	14.31	990.80	27.49	992.84	36.88	994.88	44.32
988.80	14.69	990.84	27.70	992.88	37.04	994.92	44.46
988.84	15.05	990.88	27.92	992.92	37.20	994.96	44.59
988.88	15.38	990.92	28.13	992.96	37.36	995.00	44.72
988.92	15.67	990.96	28.34	993.00	37.52		
988.96	15.92	991.00	28.54	993.04	37.67		
989.00	16.11	991.04	28.75	993.08	37.83		
989.04	16.21	991.08	28.96	993.12	37.99		
989.08	16.17	991.12	29.16	993.16	38.14		
989.12	16.06	991.16	29.36	993.20	38.30		
989.16	16.42	991.20	29.56	993.24	38.45		
989.20	16.78	991.24	29.76	993.28	38.61		
989.24	17.13	991.28	29.96	993.32	38.76		
989.28	17.47	991.32	30.16	993.36	38.91		
989.32	17.81	991.36	30.36	993.40	39.06		
989.36	18.14	991.40	30.55	993.44	39.21		
989.40	18.46	991.44	30.74	993.48	39.37		
989.44	18.78	991.48	30.94	993.52	39.52		
989.48	19.09	991.52	31.13	993.56	39.67		
989.52	19.40	991.56	31.32	993.60	39.81		
989.56	19.70	991.60	31.51	993.64	39.96		
989.60	20.00	991.64	31.69	993.68	40.11		
989.64	20.29	991.68	31.88	993.72	40.26		
989.68	20.58	991.72	32.06	993.76	40.41		
989.72	20.87	991.76	32.25	993.80	40.55		
989.76	21.15	991.80	32.43	993.84	40.70		
989.80	21.43	991.84	32.61	993.88	40.84		
989.84	21.71	991.88	32.80	993.92	40.99		
989.88	21.98	991.92	32.98	993.96	41.13		
989.92	22.24	991.96	33.15	994.00	41.28		
989.96	22.51	992.00	33.33	994.04	41.42		
990.00	22.77	992.04	33.51	994.08	41.56		

Stage-Area-Storage for Pond 3P: (new Pond)

Elevation (feet)	Surface (sq-ft)	Storage (cubic-feet)	Elevation (feet)	Surface (sq-ft)	Storage (cubic-feet)
988.00	7,354	0	993.10	21,174	78,846
988.10	7,802	758	993.20	21,389	80,974
988.20	8,262	1,561	993.30	21,606	83,124
988.30	8,736	2,411	993.40	21,824	85,295
988.40	9,224	3,308	993.50	22,043	87,489
988.50	9,724	4,256	993.60	22,263	89,704
988.60	10,238	5,254	993.70	22,484	91,941
988.70	10,765	6,304	993.80	22,706	94,201
988.80	11,305	7,407	993.90	22,930	96,483
988.90	11,858	8,565	994.00	23,154	98,787
989.00	12,425	9,779	994.10	23,397	101,114
989.10	12,628	11,032	994.20	23,640	103,466
989.20	12,833	12,305	994.30	23,886	105,843
989.30	13,040	13,599	994.40	24,132	108,243
989.40	13,248	14,913	994.50	24,380	110,669
989.50	13,458	16,248	994.60	24,629	113,119
989.60	13,670	17,605	994.70	24,879	115,595
989.70	13,883	18,982	994.80	25,130	118,095
989.80	14,098	20,382	994.90	25,383	120,621
989.90	14,315	21,802	995.00	25,637	123,172
990.00	14,533	23,245			
990.10	14,763	24,709			
990.20	14,994	26,197			
990.30	15,227	27,708			
990.40	15,462	29,243			
990.50	15,699	30,801			
990.60	15,937	32,382			
990.70	16,177	33,988			
990.80	16,419	35,618			
990.90	16,663	37,272			
991.00	16,909	38,951			
991.10	17,101	40,651			
991.20	17,293	42,371			
991.30	17,487	44,110			
991.40	17,682	45,868			
991.50	17,878	47,646			
991.60	18,074	49,444			
991.70	18,272	51,261			
991.80	18,472	53,098			
991.90	18,672	54,955			
992.00	18,873	56,833			
992.10	19,077	58,730			
992.20	19,281	60,648			
992.30	19,487	62,586			
992.40	19,694	64,545			
992.50	19,902	66,525			
992.60	20,111	68,526			
992.70	20,322	70,548			
992.80	20,533	72,590			
992.90	20,745	74,654			
993.00	20,959	76,739			

Post DEVELOPMENT DRAINAGE AREA DA1

Shawnee 5-Year Duration=16 min, Inten=4.51 in/hr

Prepared by LANDES ENGINEERING LLC

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Summary for Subcatchment 1S: Post-Dev Drainage Area DA1

Runoff = 74.34 cfs @ 0.27 hrs, Volume= 1.656 af, Depth= 0.84"

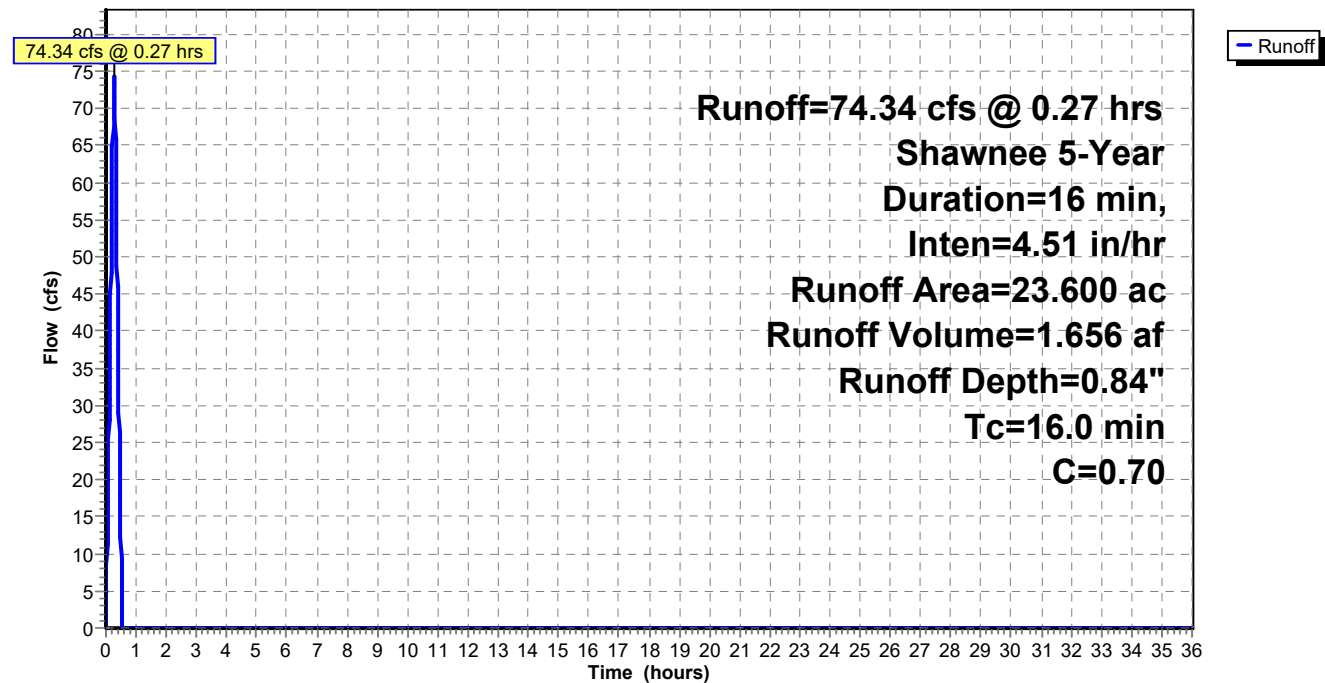
Runoff by Rational method, Rise/Fall=1.0/1.0 xTc, Time Span= 0.00-36.00 hrs, dt= 0.01 hrs
Shawnee 5-Year Duration=16 min, Inten=4.51 in/hr

Area (ac)	C	Description
23.600	0.70	GRASS
23.600		Pervious Area

Tc (min)	Length (feet)	Slope (ft/ft)	Velocity (ft/sec)	Capacity (cfs)	Description
16.0					Direct Entry,

Subcatchment 1S: Post-Dev Drainage Area DA1

Hydrograph



Hydrograph for Subcatchment 1S: Post-Dev Drainage Area DA1

Time (hours)	Runoff (cfs)	Time (hours)	Runoff (cfs)	Time (hours)	Runoff (cfs)	Time (hours)	Runoff (cfs)
0.00	0.00	10.20	0.00	20.40	0.00	30.60	0.00
0.20	56.37	10.40	0.00	20.60	0.00	30.80	0.00
0.40	37.58	10.60	0.00	20.80	0.00	31.00	0.00
0.60	0.00	10.80	0.00	21.00	0.00	31.20	0.00
0.80	0.00	11.00	0.00	21.20	0.00	31.40	0.00
1.00	0.00	11.20	0.00	21.40	0.00	31.60	0.00
1.20	0.00	11.40	0.00	21.60	0.00	31.80	0.00
1.40	0.00	11.60	0.00	21.80	0.00	32.00	0.00
1.60	0.00	11.80	0.00	22.00	0.00	32.20	0.00
1.80	0.00	12.00	0.00	22.20	0.00	32.40	0.00
2.00	0.00	12.20	0.00	22.40	0.00	32.60	0.00
2.20	0.00	12.40	0.00	22.60	0.00	32.80	0.00
2.40	0.00	12.60	0.00	22.80	0.00	33.00	0.00
2.60	0.00	12.80	0.00	23.00	0.00	33.20	0.00
2.80	0.00	13.00	0.00	23.20	0.00	33.40	0.00
3.00	0.00	13.20	0.00	23.40	0.00	33.60	0.00
3.20	0.00	13.40	0.00	23.60	0.00	33.80	0.00
3.40	0.00	13.60	0.00	23.80	0.00	34.00	0.00
3.60	0.00	13.80	0.00	24.00	0.00	34.20	0.00
3.80	0.00	14.00	0.00	24.20	0.00	34.40	0.00
4.00	0.00	14.20	0.00	24.40	0.00	34.60	0.00
4.20	0.00	14.40	0.00	24.60	0.00	34.80	0.00
4.40	0.00	14.60	0.00	24.80	0.00	35.00	0.00
4.60	0.00	14.80	0.00	25.00	0.00	35.20	0.00
4.80	0.00	15.00	0.00	25.20	0.00	35.40	0.00
5.00	0.00	15.20	0.00	25.40	0.00	35.60	0.00
5.20	0.00	15.40	0.00	25.60	0.00	35.80	0.00
5.40	0.00	15.60	0.00	25.80	0.00	36.00	0.00
5.60	0.00	15.80	0.00	26.00	0.00		
5.80	0.00	16.00	0.00	26.20	0.00		
6.00	0.00	16.20	0.00	26.40	0.00		
6.20	0.00	16.40	0.00	26.60	0.00		
6.40	0.00	16.60	0.00	26.80	0.00		
6.60	0.00	16.80	0.00	27.00	0.00		
6.80	0.00	17.00	0.00	27.20	0.00		
7.00	0.00	17.20	0.00	27.40	0.00		
7.20	0.00	17.40	0.00	27.60	0.00		
7.40	0.00	17.60	0.00	27.80	0.00		
7.60	0.00	17.80	0.00	28.00	0.00		
7.80	0.00	18.00	0.00	28.20	0.00		
8.00	0.00	18.20	0.00	28.40	0.00		
8.20	0.00	18.40	0.00	28.60	0.00		
8.40	0.00	18.60	0.00	28.80	0.00		
8.60	0.00	18.80	0.00	29.00	0.00		
8.80	0.00	19.00	0.00	29.20	0.00		
9.00	0.00	19.20	0.00	29.40	0.00		
9.20	0.00	19.40	0.00	29.60	0.00		
9.40	0.00	19.60	0.00	29.80	0.00		
9.60	0.00	19.80	0.00	30.00	0.00		
9.80	0.00	20.00	0.00	30.20	0.00		
10.00	0.00	20.20	0.00	30.40	0.00		

Summary for Pond 3P: (new Pond)

Inflow Area = 23.600 ac, 0.00% Impervious, Inflow Depth = 0.84" for 5-Year event
 Inflow = 74.34 cfs @ 0.27 hrs, Volume= 1.656 af
 Outflow = 28.55 cfs @ 0.43 hrs, Volume= 1.656 af, Atten= 62% Lag= 9.9 min
 Primary = 28.55 cfs @ 0.43 hrs, Volume= 1.656 af

Routing by Stor-Ind method, Time Span= 0.00-36.00 hrs, dt= 0.01 hrs
 Peak Elev= 991.00' @ 0.43 hrs Surf.Area= 16,910 sf Storage= 38,959 cf

Plug-Flow detention time= 15.9 min calculated for 1.656 af (100% of inflow)
 Center-of-Mass det. time= 15.9 min (31.9 - 16.0)

Volume	Invert	Avail.Storage	Storage Description		
#1	988.00'	123,172 cf	Custom Stage Data (Irregular) Listed below (Recalc)		
Elevation (feet)	Surf.Area (sq-ft)	Perim. (feet)	Inc.Store (cubic-feet)	Cum.Store (cubic-feet)	Wet.Area (sq-ft)
988.00	7,354	425.0	0	0	7,354
989.00	12,425	660.5	9,779	9,779	27,704
990.00	14,533	669.0	13,465	23,245	28,822
991.00	16,909	681.0	15,706	38,951	30,278
992.00	18,873	693.0	17,882	56,833	31,759
993.00	20,959	717.0	19,907	76,739	34,542
994.00	23,154	738.0	22,047	98,787	37,080
995.00	25,637	765.0	24,385	123,172	40,396

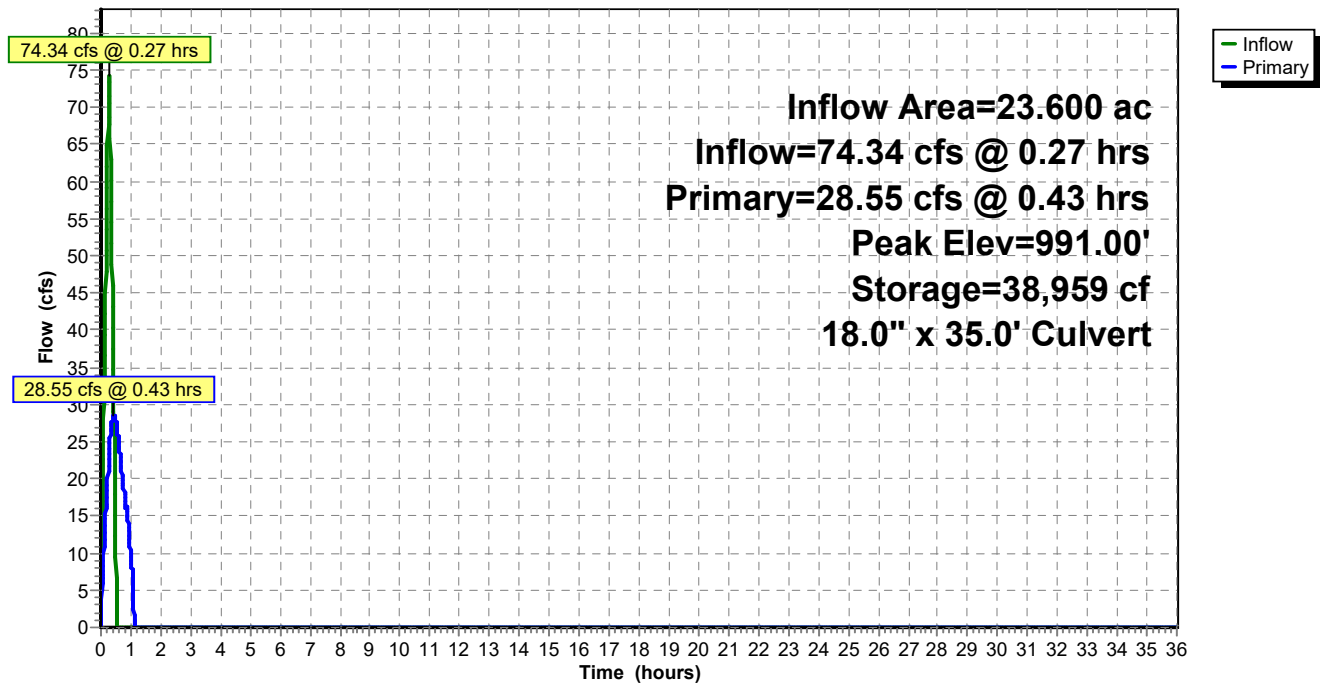
Device	Routing	Invert	Outlet Devices
#1	Primary	987.10'	18.0" x 35.0' long Culvert X 2.00 Box, 30-75° wingwalls, rounded crown, Ke= 0.200 Outlet Invert= 986.75' S= 0.0100 '/' Cc= 0.900 n= 0.020 Corrugated PE, corrugated interior

Primary OutFlow Max=28.54 cfs @ 0.43 hrs HW=991.00' (Free Discharge)

↑ **1=Culvert** (Barrel Controls 28.54 cfs @ 8.08 fps)

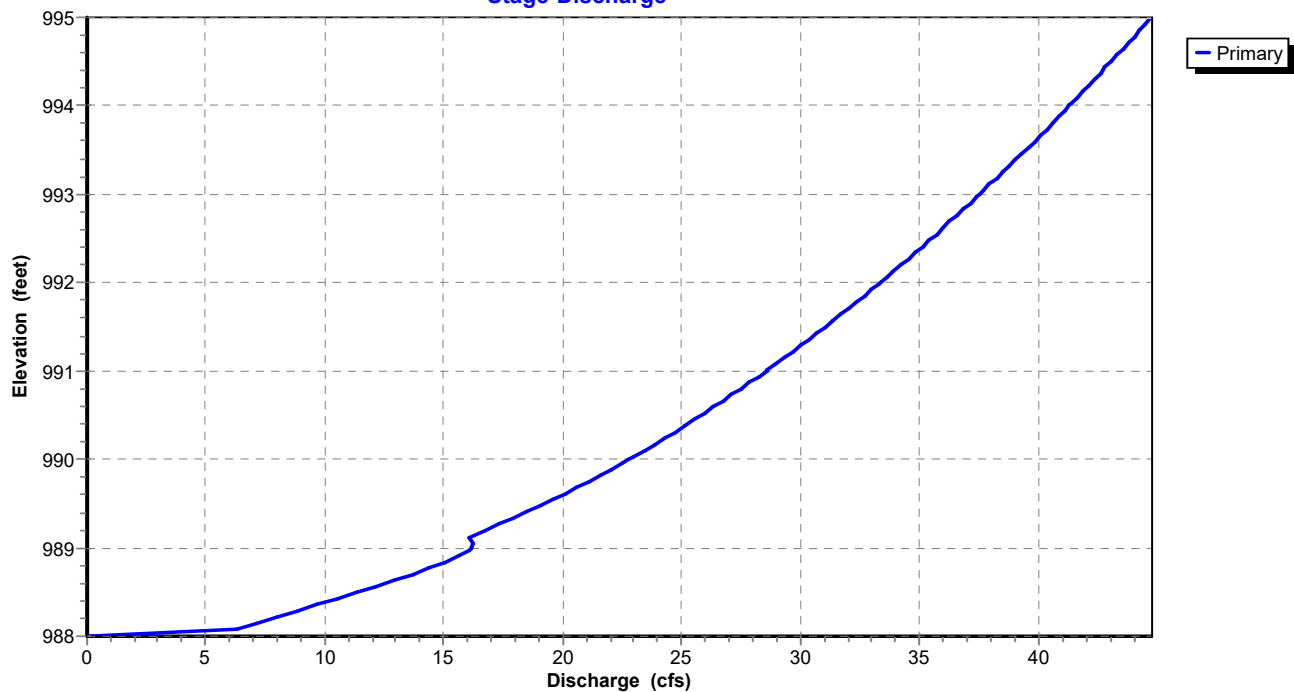
Pond 3P: (new Pond)

Hydrograph



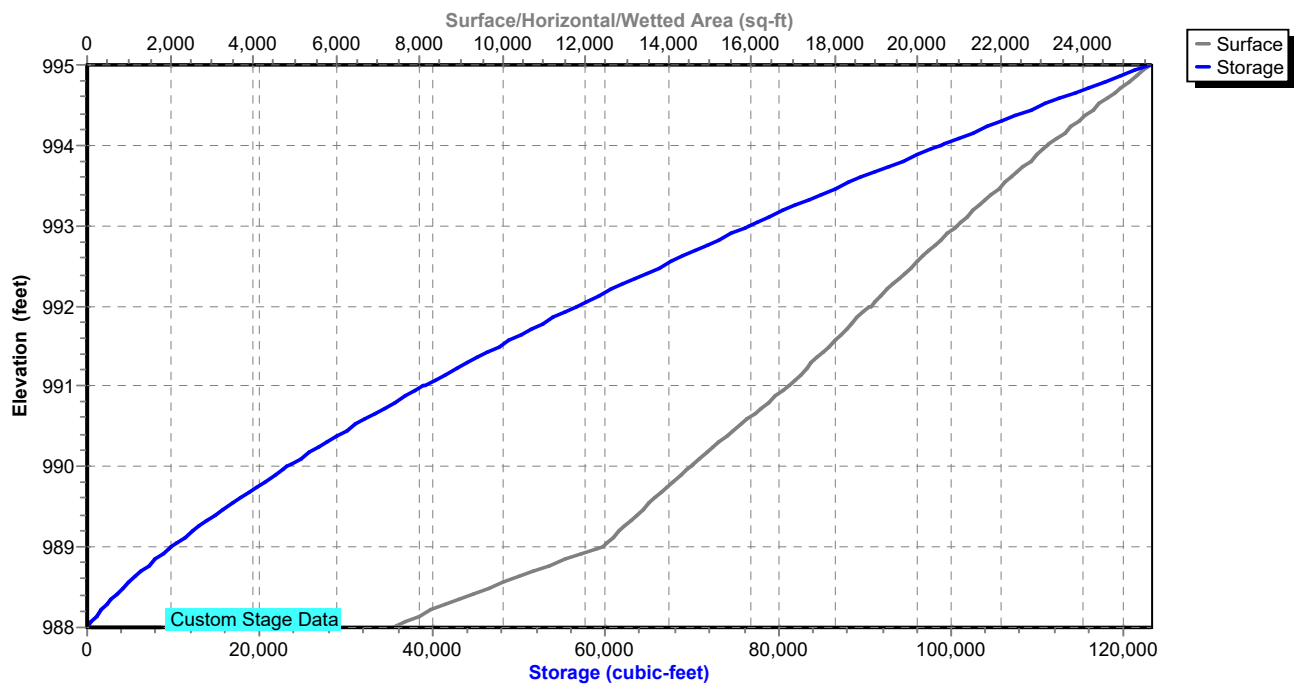
Pond 3P: (new Pond)

Stage-Discharge



Pond 3P: (new Pond)

Stage-Area-Storage



Hydrograph for Pond 3P: (new Pond)

Time (hours)	Inflow (cfs)	Storage (cubic-feet)	Elevation (feet)	Primary (cfs)
0.00	0.00	0	988.00	0.00
1.00	0.00	2,709	988.33	9.43
2.00	0.00	0	988.00	0.00
3.00	0.00	0	988.00	0.00
4.00	0.00	0	988.00	0.00
5.00	0.00	0	988.00	0.00
6.00	0.00	0	988.00	0.00
7.00	0.00	0	988.00	0.00
8.00	0.00	0	988.00	0.00
9.00	0.00	0	988.00	0.00
10.00	0.00	0	988.00	0.00
11.00	0.00	0	988.00	0.00
12.00	0.00	0	988.00	0.00
13.00	0.00	0	988.00	0.00
14.00	0.00	0	988.00	0.00
15.00	0.00	0	988.00	0.00
16.00	0.00	0	988.00	0.00
17.00	0.00	0	988.00	0.00
18.00	0.00	0	988.00	0.00
19.00	0.00	0	988.00	0.00
20.00	0.00	0	988.00	0.00
21.00	0.00	0	988.00	0.00
22.00	0.00	0	988.00	0.00
23.00	0.00	0	988.00	0.00
24.00	0.00	0	988.00	0.00
25.00	0.00	0	988.00	0.00
26.00	0.00	0	988.00	0.00
27.00	0.00	0	988.00	0.00
28.00	0.00	0	988.00	0.00
29.00	0.00	0	988.00	0.00
30.00	0.00	0	988.00	0.00
31.00	0.00	0	988.00	0.00
32.00	0.00	0	988.00	0.00
33.00	0.00	0	988.00	0.00
34.00	0.00	0	988.00	0.00
35.00	0.00	0	988.00	0.00
36.00	0.00	0	988.00	0.00

Stage-Discharge for Pond 3P: (new Pond)

Elevation (feet)	Primary (cfs)	Elevation (feet)	Primary (cfs)	Elevation (feet)	Primary (cfs)	Elevation (feet)	Primary (cfs)
988.00	0.00	990.04	23.03	992.08	33.69	994.12	41.70
988.04	5.99	990.08	23.29	992.12	33.86	994.16	41.85
988.08	6.44	990.12	23.54	992.16	34.04	994.20	41.99
988.12	6.90	990.16	23.79	992.20	34.21	994.24	42.13
988.16	7.36	990.20	24.04	992.24	34.38	994.28	42.27
988.20	7.83	990.24	24.28	992.28	34.56	994.32	42.41
988.24	8.31	990.28	24.53	992.32	34.73	994.36	42.55
988.28	8.79	990.32	24.77	992.36	34.90	994.40	42.69
988.32	9.27	990.36	25.00	992.40	35.07	994.44	42.83
988.36	9.75	990.40	25.24	992.44	35.23	994.48	42.96
988.40	10.24	990.44	25.47	992.48	35.40	994.52	43.10
988.44	10.72	990.48	25.70	992.52	35.57	994.56	43.24
988.48	11.20	990.52	25.93	992.56	35.74	994.60	43.38
988.52	11.67	990.56	26.16	992.60	35.90	994.64	43.51
988.56	12.14	990.60	26.39	992.64	36.07	994.68	43.65
988.60	12.60	990.64	26.61	992.68	36.23	994.72	43.78
988.64	13.04	990.68	26.83	992.72	36.39	994.76	43.92
988.68	13.48	990.72	27.05	992.76	36.56	994.80	44.05
988.72	13.90	990.76	27.27	992.80	36.72	994.84	44.19
988.76	14.31	990.80	27.49	992.84	36.88	994.88	44.32
988.80	14.69	990.84	27.70	992.88	37.04	994.92	44.46
988.84	15.05	990.88	27.92	992.92	37.20	994.96	44.59
988.88	15.38	990.92	28.13	992.96	37.36	995.00	44.72
988.92	15.67	990.96	28.34	993.00	37.52		
988.96	15.92	991.00	28.54	993.04	37.67		
989.00	16.11	991.04	28.75	993.08	37.83		
989.04	16.21	991.08	28.96	993.12	37.99		
989.08	16.17	991.12	29.16	993.16	38.14		
989.12	16.06	991.16	29.36	993.20	38.30		
989.16	16.42	991.20	29.56	993.24	38.45		
989.20	16.78	991.24	29.76	993.28	38.61		
989.24	17.13	991.28	29.96	993.32	38.76		
989.28	17.47	991.32	30.16	993.36	38.91		
989.32	17.81	991.36	30.36	993.40	39.06		
989.36	18.14	991.40	30.55	993.44	39.21		
989.40	18.46	991.44	30.74	993.48	39.37		
989.44	18.78	991.48	30.94	993.52	39.52		
989.48	19.09	991.52	31.13	993.56	39.67		
989.52	19.40	991.56	31.32	993.60	39.81		
989.56	19.70	991.60	31.51	993.64	39.96		
989.60	20.00	991.64	31.69	993.68	40.11		
989.64	20.29	991.68	31.88	993.72	40.26		
989.68	20.58	991.72	32.06	993.76	40.41		
989.72	20.87	991.76	32.25	993.80	40.55		
989.76	21.15	991.80	32.43	993.84	40.70		
989.80	21.43	991.84	32.61	993.88	40.84		
989.84	21.71	991.88	32.80	993.92	40.99		
989.88	21.98	991.92	32.98	993.96	41.13		
989.92	22.24	991.96	33.15	994.00	41.28		
989.96	22.51	992.00	33.33	994.04	41.42		
990.00	22.77	992.04	33.51	994.08	41.56		

Stage-Area-Storage for Pond 3P: (new Pond)

Elevation (feet)	Surface (sq-ft)	Storage (cubic-feet)	Elevation (feet)	Surface (sq-ft)	Storage (cubic-feet)
988.00	7,354	0	993.10	21,174	78,846
988.10	7,802	758	993.20	21,389	80,974
988.20	8,262	1,561	993.30	21,606	83,124
988.30	8,736	2,411	993.40	21,824	85,295
988.40	9,224	3,308	993.50	22,043	87,489
988.50	9,724	4,256	993.60	22,263	89,704
988.60	10,238	5,254	993.70	22,484	91,941
988.70	10,765	6,304	993.80	22,706	94,201
988.80	11,305	7,407	993.90	22,930	96,483
988.90	11,858	8,565	994.00	23,154	98,787
989.00	12,425	9,779	994.10	23,397	101,114
989.10	12,628	11,032	994.20	23,640	103,466
989.20	12,833	12,305	994.30	23,886	105,843
989.30	13,040	13,599	994.40	24,132	108,243
989.40	13,248	14,913	994.50	24,380	110,669
989.50	13,458	16,248	994.60	24,629	113,119
989.60	13,670	17,605	994.70	24,879	115,595
989.70	13,883	18,982	994.80	25,130	118,095
989.80	14,098	20,382	994.90	25,383	120,621
989.90	14,315	21,802	995.00	25,637	123,172
990.00	14,533	23,245			
990.10	14,763	24,709			
990.20	14,994	26,197			
990.30	15,227	27,708			
990.40	15,462	29,243			
990.50	15,699	30,801			
990.60	15,937	32,382			
990.70	16,177	33,988			
990.80	16,419	35,618			
990.90	16,663	37,272			
991.00	16,909	38,951			
991.10	17,101	40,651			
991.20	17,293	42,371			
991.30	17,487	44,110			
991.40	17,682	45,868			
991.50	17,878	47,646			
991.60	18,074	49,444			
991.70	18,272	51,261			
991.80	18,472	53,098			
991.90	18,672	54,955			
992.00	18,873	56,833			
992.10	19,077	58,730			
992.20	19,281	60,648			
992.30	19,487	62,586			
992.40	19,694	64,545			
992.50	19,902	66,525			
992.60	20,111	68,526			
992.70	20,322	70,548			
992.80	20,533	72,590			
992.90	20,745	74,654			
993.00	20,959	76,739			

Summary for Subcatchment 1S: Post-Dev Drainage Area DA1

Runoff = 84.51 cfs @ 0.27 hrs, Volume= 1.883 af, Depth= 0.96"

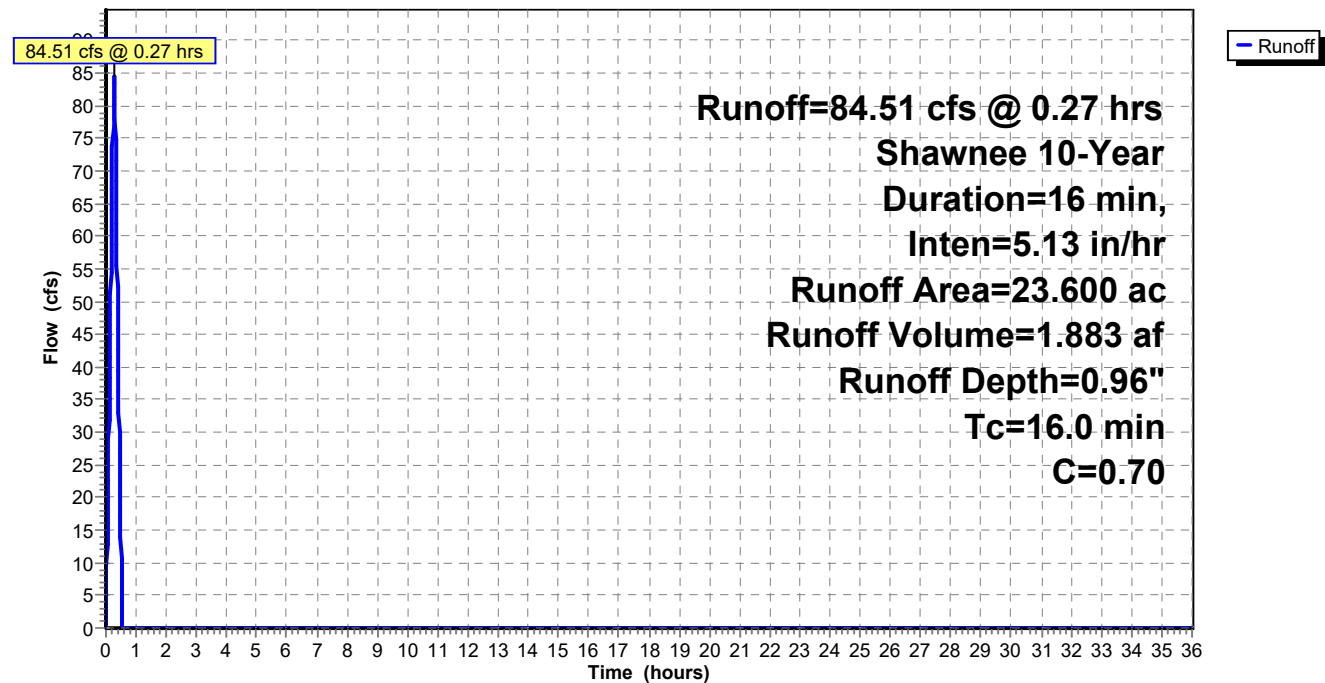
Runoff by Rational method, Rise/Fall=1.0/1.0 xTc, Time Span= 0.00-36.00 hrs, dt= 0.01 hrs
 Shawnee 10-Year Duration=16 min, Inten=5.13 in/hr

Area (ac)	C	Description
23.600	0.70	GRASS
23.600		Pervious Area

Tc (min)	Length (feet)	Slope (ft/ft)	Velocity (ft/sec)	Capacity (cfs)	Description
16.0					Direct Entry,

Subcatchment 1S: Post-Dev Drainage Area DA1

Hydrograph



Hydrograph for Subcatchment 1S: Post-Dev Drainage Area DA1

Time (hours)	Runoff (cfs)	Time (hours)	Runoff (cfs)	Time (hours)	Runoff (cfs)	Time (hours)	Runoff (cfs)
0.00	0.00	10.20	0.00	20.40	0.00	30.60	0.00
0.20	64.08	10.40	0.00	20.60	0.00	30.80	0.00
0.40	42.72	10.60	0.00	20.80	0.00	31.00	0.00
0.60	0.00	10.80	0.00	21.00	0.00	31.20	0.00
0.80	0.00	11.00	0.00	21.20	0.00	31.40	0.00
1.00	0.00	11.20	0.00	21.40	0.00	31.60	0.00
1.20	0.00	11.40	0.00	21.60	0.00	31.80	0.00
1.40	0.00	11.60	0.00	21.80	0.00	32.00	0.00
1.60	0.00	11.80	0.00	22.00	0.00	32.20	0.00
1.80	0.00	12.00	0.00	22.20	0.00	32.40	0.00
2.00	0.00	12.20	0.00	22.40	0.00	32.60	0.00
2.20	0.00	12.40	0.00	22.60	0.00	32.80	0.00
2.40	0.00	12.60	0.00	22.80	0.00	33.00	0.00
2.60	0.00	12.80	0.00	23.00	0.00	33.20	0.00
2.80	0.00	13.00	0.00	23.20	0.00	33.40	0.00
3.00	0.00	13.20	0.00	23.40	0.00	33.60	0.00
3.20	0.00	13.40	0.00	23.60	0.00	33.80	0.00
3.40	0.00	13.60	0.00	23.80	0.00	34.00	0.00
3.60	0.00	13.80	0.00	24.00	0.00	34.20	0.00
3.80	0.00	14.00	0.00	24.20	0.00	34.40	0.00
4.00	0.00	14.20	0.00	24.40	0.00	34.60	0.00
4.20	0.00	14.40	0.00	24.60	0.00	34.80	0.00
4.40	0.00	14.60	0.00	24.80	0.00	35.00	0.00
4.60	0.00	14.80	0.00	25.00	0.00	35.20	0.00
4.80	0.00	15.00	0.00	25.20	0.00	35.40	0.00
5.00	0.00	15.20	0.00	25.40	0.00	35.60	0.00
5.20	0.00	15.40	0.00	25.60	0.00	35.80	0.00
5.40	0.00	15.60	0.00	25.80	0.00	36.00	0.00
5.60	0.00	15.80	0.00	26.00	0.00		
5.80	0.00	16.00	0.00	26.20	0.00		
6.00	0.00	16.20	0.00	26.40	0.00		
6.20	0.00	16.40	0.00	26.60	0.00		
6.40	0.00	16.60	0.00	26.80	0.00		
6.60	0.00	16.80	0.00	27.00	0.00		
6.80	0.00	17.00	0.00	27.20	0.00		
7.00	0.00	17.20	0.00	27.40	0.00		
7.20	0.00	17.40	0.00	27.60	0.00		
7.40	0.00	17.60	0.00	27.80	0.00		
7.60	0.00	17.80	0.00	28.00	0.00		
7.80	0.00	18.00	0.00	28.20	0.00		
8.00	0.00	18.20	0.00	28.40	0.00		
8.20	0.00	18.40	0.00	28.60	0.00		
8.40	0.00	18.60	0.00	28.80	0.00		
8.60	0.00	18.80	0.00	29.00	0.00		
8.80	0.00	19.00	0.00	29.20	0.00		
9.00	0.00	19.20	0.00	29.40	0.00		
9.20	0.00	19.40	0.00	29.60	0.00		
9.40	0.00	19.60	0.00	29.80	0.00		
9.60	0.00	19.80	0.00	30.00	0.00		
9.80	0.00	20.00	0.00	30.20	0.00		
10.00	0.00	20.20	0.00	30.40	0.00		

Summary for Pond 3P: (new Pond)

Inflow Area = 23.600 ac, 0.00% Impervious, Inflow Depth = 0.96" for 10-Year event
 Inflow = 84.51 cfs @ 0.27 hrs, Volume= 1.883 af
 Outflow = 30.63 cfs @ 0.44 hrs, Volume= 1.883 af, Atten= 64% Lag= 10.2 min
 Primary = 30.63 cfs @ 0.44 hrs, Volume= 1.883 af

Routing by Stor-Ind method, Time Span= 0.00-36.00 hrs, dt= 0.01 hrs
 Peak Elev= 991.42' @ 0.44 hrs Surf.Area= 17,715 sf Storage= 46,172 cf

Plug-Flow detention time= 17.4 min calculated for 1.883 af (100% of inflow)
 Center-of-Mass det. time= 17.4 min (33.4 - 16.0)

Volume	Invert	Avail.Storage	Storage Description
#1	988.00'	123,172 cf	Custom Stage Data (Irregular) Listed below (Recalc)

Elevation (feet)	Surf.Area (sq-ft)	Perim. (feet)	Inc.Store (cubic-feet)	Cum.Store (cubic-feet)	Wet.Area (sq-ft)
988.00	7,354	425.0	0	0	7,354
989.00	12,425	660.5	9,779	9,779	27,704
990.00	14,533	669.0	13,465	23,245	28,822
991.00	16,909	681.0	15,706	38,951	30,278
992.00	18,873	693.0	17,882	56,833	31,759
993.00	20,959	717.0	19,907	76,739	34,542
994.00	23,154	738.0	22,047	98,787	37,080
995.00	25,637	765.0	24,385	123,172	40,396

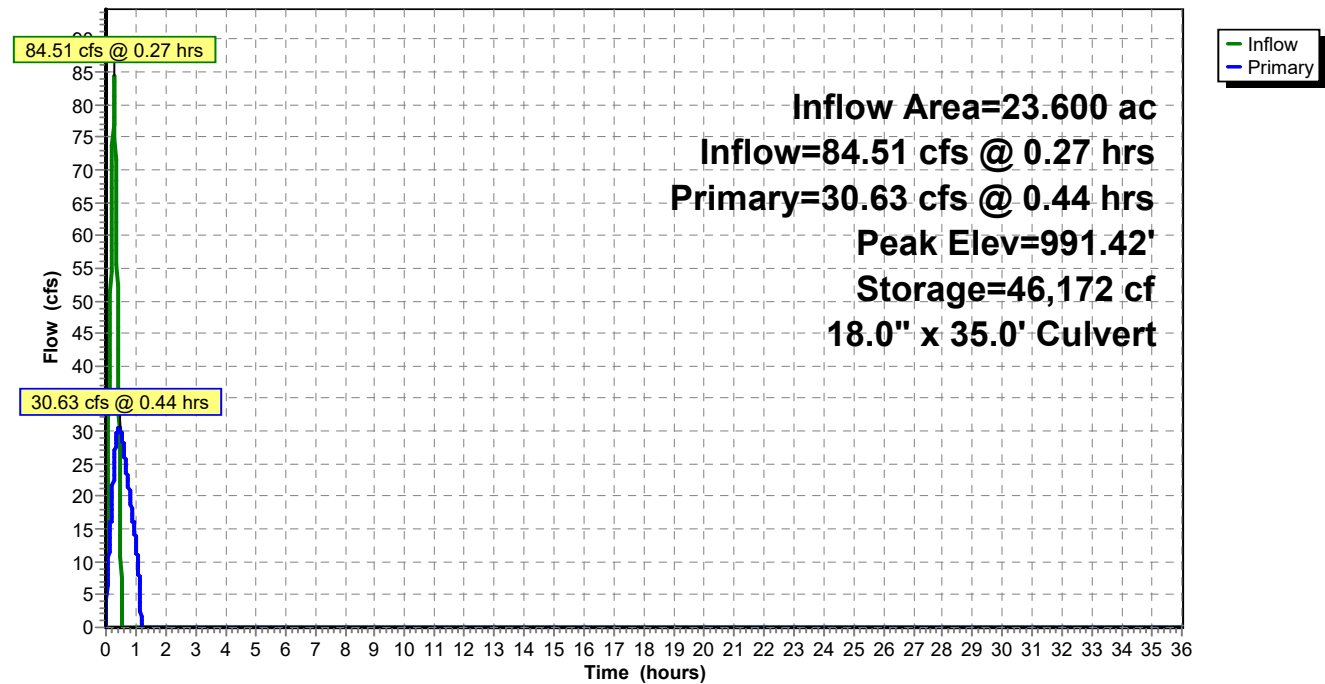
Device	Routing	Invert	Outlet Devices
#1	Primary	987.10'	18.0" x 35.0' long Culvert X 2.00 Box, 30-75° wingwalls, rounded crown, Ke= 0.200 Outlet Invert= 986.75' S= 0.0100 '/' Cc= 0.900 n= 0.020 Corrugated PE, corrugated interior

Primary OutFlow Max=30.63 cfs @ 0.44 hrs HW=991.42' (Free Discharge)

↑ **1=Culvert** (Barrel Controls 30.63 cfs @ 8.67 fps)

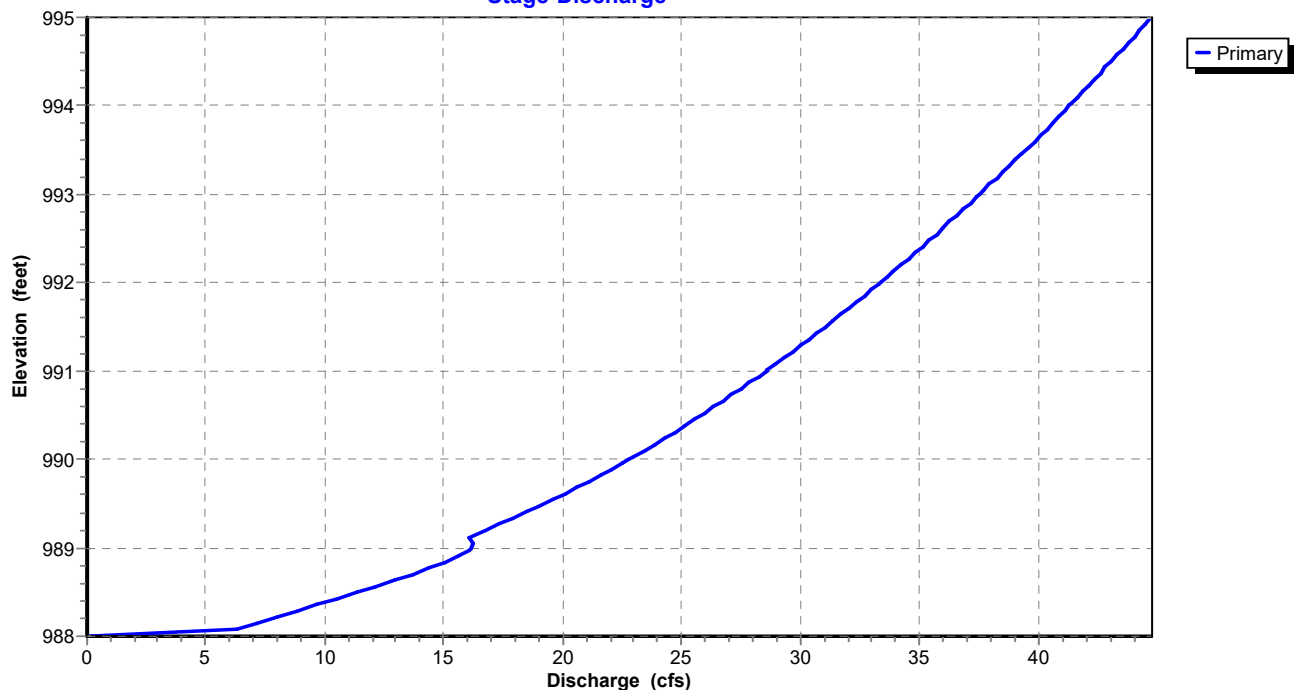
Pond 3P: (new Pond)

Hydrograph



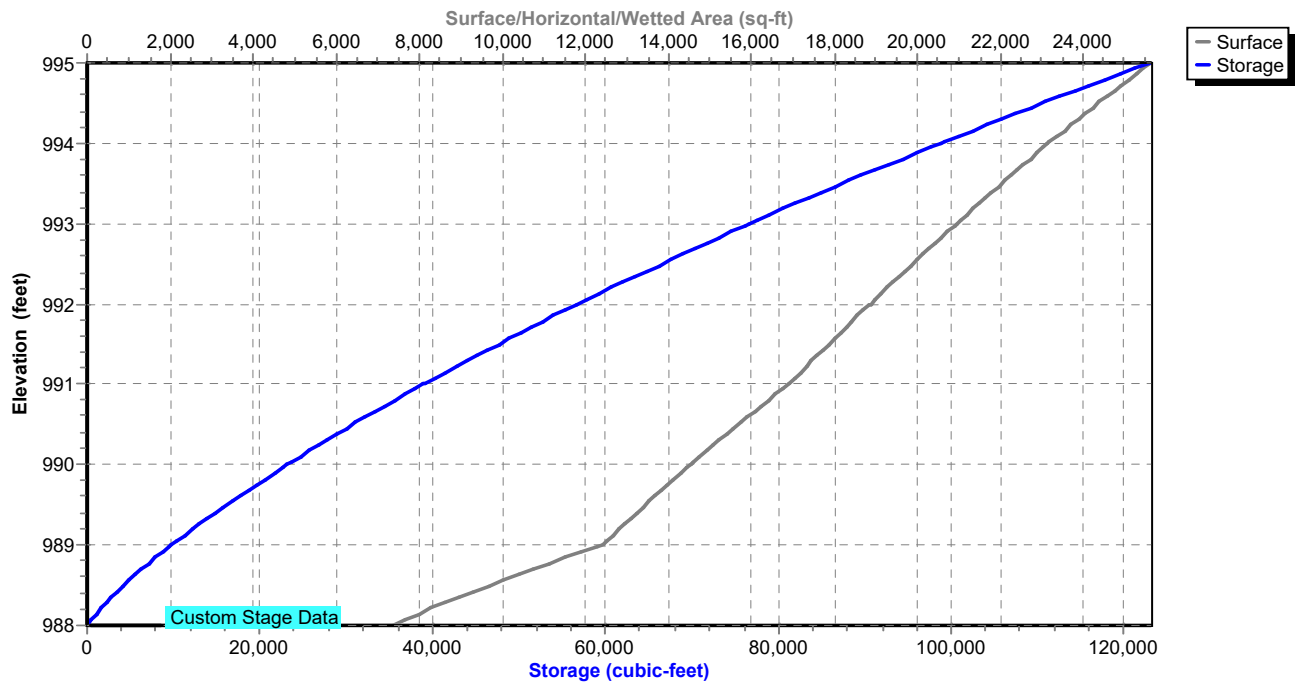
Pond 3P: (new Pond)

Stage-Discharge



Pond 3P: (new Pond)

Stage-Area-Storage



Hydrograph for Pond 3P: (new Pond)

Time (hours)	Inflow (cfs)	Storage (cubic-feet)	Elevation (feet)	Primary (cfs)
0.00	0.00	0	988.00	0.00
1.00	0.00	5,534	988.63	12.90
2.00	0.00	0	988.00	0.00
3.00	0.00	0	988.00	0.00
4.00	0.00	0	988.00	0.00
5.00	0.00	0	988.00	0.00
6.00	0.00	0	988.00	0.00
7.00	0.00	0	988.00	0.00
8.00	0.00	0	988.00	0.00
9.00	0.00	0	988.00	0.00
10.00	0.00	0	988.00	0.00
11.00	0.00	0	988.00	0.00
12.00	0.00	0	988.00	0.00
13.00	0.00	0	988.00	0.00
14.00	0.00	0	988.00	0.00
15.00	0.00	0	988.00	0.00
16.00	0.00	0	988.00	0.00
17.00	0.00	0	988.00	0.00
18.00	0.00	0	988.00	0.00
19.00	0.00	0	988.00	0.00
20.00	0.00	0	988.00	0.00
21.00	0.00	0	988.00	0.00
22.00	0.00	0	988.00	0.00
23.00	0.00	0	988.00	0.00
24.00	0.00	0	988.00	0.00
25.00	0.00	0	988.00	0.00
26.00	0.00	0	988.00	0.00
27.00	0.00	0	988.00	0.00
28.00	0.00	0	988.00	0.00
29.00	0.00	0	988.00	0.00
30.00	0.00	0	988.00	0.00
31.00	0.00	0	988.00	0.00
32.00	0.00	0	988.00	0.00
33.00	0.00	0	988.00	0.00
34.00	0.00	0	988.00	0.00
35.00	0.00	0	988.00	0.00
36.00	0.00	0	988.00	0.00

Stage-Discharge for Pond 3P: (new Pond)

Elevation (feet)	Primary (cfs)	Elevation (feet)	Primary (cfs)	Elevation (feet)	Primary (cfs)	Elevation (feet)	Primary (cfs)
988.00	0.00	990.04	23.03	992.08	33.69	994.12	41.70
988.04	5.99	990.08	23.29	992.12	33.86	994.16	41.85
988.08	6.44	990.12	23.54	992.16	34.04	994.20	41.99
988.12	6.90	990.16	23.79	992.20	34.21	994.24	42.13
988.16	7.36	990.20	24.04	992.24	34.38	994.28	42.27
988.20	7.83	990.24	24.28	992.28	34.56	994.32	42.41
988.24	8.31	990.28	24.53	992.32	34.73	994.36	42.55
988.28	8.79	990.32	24.77	992.36	34.90	994.40	42.69
988.32	9.27	990.36	25.00	992.40	35.07	994.44	42.83
988.36	9.75	990.40	25.24	992.44	35.23	994.48	42.96
988.40	10.24	990.44	25.47	992.48	35.40	994.52	43.10
988.44	10.72	990.48	25.70	992.52	35.57	994.56	43.24
988.48	11.20	990.52	25.93	992.56	35.74	994.60	43.38
988.52	11.67	990.56	26.16	992.60	35.90	994.64	43.51
988.56	12.14	990.60	26.39	992.64	36.07	994.68	43.65
988.60	12.60	990.64	26.61	992.68	36.23	994.72	43.78
988.64	13.04	990.68	26.83	992.72	36.39	994.76	43.92
988.68	13.48	990.72	27.05	992.76	36.56	994.80	44.05
988.72	13.90	990.76	27.27	992.80	36.72	994.84	44.19
988.76	14.31	990.80	27.49	992.84	36.88	994.88	44.32
988.80	14.69	990.84	27.70	992.88	37.04	994.92	44.46
988.84	15.05	990.88	27.92	992.92	37.20	994.96	44.59
988.88	15.38	990.92	28.13	992.96	37.36	995.00	44.72
988.92	15.67	990.96	28.34	993.00	37.52		
988.96	15.92	991.00	28.54	993.04	37.67		
989.00	16.11	991.04	28.75	993.08	37.83		
989.04	16.21	991.08	28.96	993.12	37.99		
989.08	16.17	991.12	29.16	993.16	38.14		
989.12	16.06	991.16	29.36	993.20	38.30		
989.16	16.42	991.20	29.56	993.24	38.45		
989.20	16.78	991.24	29.76	993.28	38.61		
989.24	17.13	991.28	29.96	993.32	38.76		
989.28	17.47	991.32	30.16	993.36	38.91		
989.32	17.81	991.36	30.36	993.40	39.06		
989.36	18.14	991.40	30.55	993.44	39.21		
989.40	18.46	991.44	30.74	993.48	39.37		
989.44	18.78	991.48	30.94	993.52	39.52		
989.48	19.09	991.52	31.13	993.56	39.67		
989.52	19.40	991.56	31.32	993.60	39.81		
989.56	19.70	991.60	31.51	993.64	39.96		
989.60	20.00	991.64	31.69	993.68	40.11		
989.64	20.29	991.68	31.88	993.72	40.26		
989.68	20.58	991.72	32.06	993.76	40.41		
989.72	20.87	991.76	32.25	993.80	40.55		
989.76	21.15	991.80	32.43	993.84	40.70		
989.80	21.43	991.84	32.61	993.88	40.84		
989.84	21.71	991.88	32.80	993.92	40.99		
989.88	21.98	991.92	32.98	993.96	41.13		
989.92	22.24	991.96	33.15	994.00	41.28		
989.96	22.51	992.00	33.33	994.04	41.42		
990.00	22.77	992.04	33.51	994.08	41.56		

Stage-Area-Storage for Pond 3P: (new Pond)

Elevation (feet)	Surface (sq-ft)	Storage (cubic-feet)	Elevation (feet)	Surface (sq-ft)	Storage (cubic-feet)
988.00	7,354	0	993.10	21,174	78,846
988.10	7,802	758	993.20	21,389	80,974
988.20	8,262	1,561	993.30	21,606	83,124
988.30	8,736	2,411	993.40	21,824	85,295
988.40	9,224	3,308	993.50	22,043	87,489
988.50	9,724	4,256	993.60	22,263	89,704
988.60	10,238	5,254	993.70	22,484	91,941
988.70	10,765	6,304	993.80	22,706	94,201
988.80	11,305	7,407	993.90	22,930	96,483
988.90	11,858	8,565	994.00	23,154	98,787
989.00	12,425	9,779	994.10	23,397	101,114
989.10	12,628	11,032	994.20	23,640	103,466
989.20	12,833	12,305	994.30	23,886	105,843
989.30	13,040	13,599	994.40	24,132	108,243
989.40	13,248	14,913	994.50	24,380	110,669
989.50	13,458	16,248	994.60	24,629	113,119
989.60	13,670	17,605	994.70	24,879	115,595
989.70	13,883	18,982	994.80	25,130	118,095
989.80	14,098	20,382	994.90	25,383	120,621
989.90	14,315	21,802	995.00	25,637	123,172
990.00	14,533	23,245			
990.10	14,763	24,709			
990.20	14,994	26,197			
990.30	15,227	27,708			
990.40	15,462	29,243			
990.50	15,699	30,801			
990.60	15,937	32,382			
990.70	16,177	33,988			
990.80	16,419	35,618			
990.90	16,663	37,272			
991.00	16,909	38,951			
991.10	17,101	40,651			
991.20	17,293	42,371			
991.30	17,487	44,110			
991.40	17,682	45,868			
991.50	17,878	47,646			
991.60	18,074	49,444			
991.70	18,272	51,261			
991.80	18,472	53,098			
991.90	18,672	54,955			
992.00	18,873	56,833			
992.10	19,077	58,730			
992.20	19,281	60,648			
992.30	19,487	62,586			
992.40	19,694	64,545			
992.50	19,902	66,525			
992.60	20,111	68,526			
992.70	20,322	70,548			
992.80	20,533	72,590			
992.90	20,745	74,654			
993.00	20,959	76,739			

Summary for Subcatchment 1S: Post-Dev Drainage Area DA1

Runoff = 99.21 cfs @ 0.27 hrs, Volume= 2.210 af, Depth= 1.12"

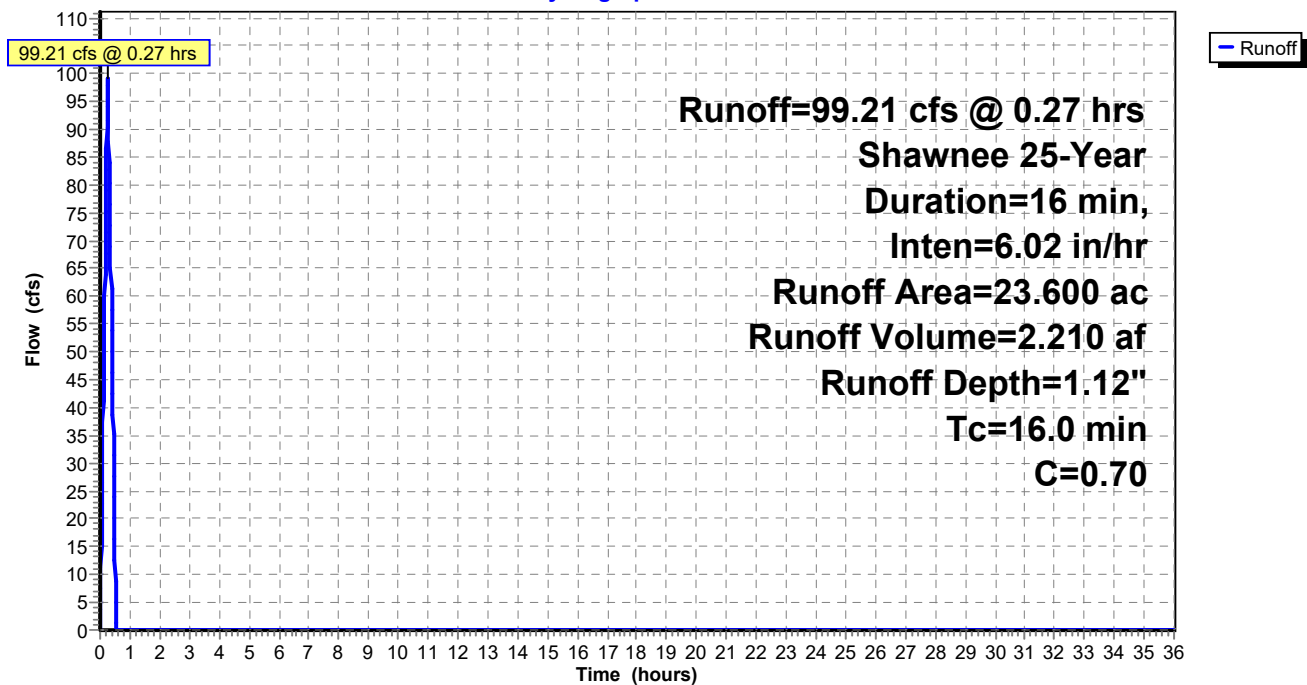
Runoff by Rational method, Rise/Fall=1.0/1.0 xTc, Time Span= 0.00-36.00 hrs, dt= 0.01 hrs
 Shawnee 25-Year Duration=16 min, Inten=6.02 in/hr

Area (ac)	C	Description
23.600	0.70	GRASS
23.600		Pervious Area

Tc (min)	Length (feet)	Slope (ft/ft)	Velocity (ft/sec)	Capacity (cfs)	Description
16.0					Direct Entry,

Subcatchment 1S: Post-Dev Drainage Area DA1

Hydrograph



Hydrograph for Subcatchment 1S: Post-Dev Drainage Area DA1

Time (hours)	Runoff (cfs)	Time (hours)	Runoff (cfs)	Time (hours)	Runoff (cfs)	Time (hours)	Runoff (cfs)
0.00	0.00	10.20	0.00	20.40	0.00	30.60	0.00
0.20	75.23	10.40	0.00	20.60	0.00	30.80	0.00
0.40	50.15	10.60	0.00	20.80	0.00	31.00	0.00
0.60	0.00	10.80	0.00	21.00	0.00	31.20	0.00
0.80	0.00	11.00	0.00	21.20	0.00	31.40	0.00
1.00	0.00	11.20	0.00	21.40	0.00	31.60	0.00
1.20	0.00	11.40	0.00	21.60	0.00	31.80	0.00
1.40	0.00	11.60	0.00	21.80	0.00	32.00	0.00
1.60	0.00	11.80	0.00	22.00	0.00	32.20	0.00
1.80	0.00	12.00	0.00	22.20	0.00	32.40	0.00
2.00	0.00	12.20	0.00	22.40	0.00	32.60	0.00
2.20	0.00	12.40	0.00	22.60	0.00	32.80	0.00
2.40	0.00	12.60	0.00	22.80	0.00	33.00	0.00
2.60	0.00	12.80	0.00	23.00	0.00	33.20	0.00
2.80	0.00	13.00	0.00	23.20	0.00	33.40	0.00
3.00	0.00	13.20	0.00	23.40	0.00	33.60	0.00
3.20	0.00	13.40	0.00	23.60	0.00	33.80	0.00
3.40	0.00	13.60	0.00	23.80	0.00	34.00	0.00
3.60	0.00	13.80	0.00	24.00	0.00	34.20	0.00
3.80	0.00	14.00	0.00	24.20	0.00	34.40	0.00
4.00	0.00	14.20	0.00	24.40	0.00	34.60	0.00
4.20	0.00	14.40	0.00	24.60	0.00	34.80	0.00
4.40	0.00	14.60	0.00	24.80	0.00	35.00	0.00
4.60	0.00	14.80	0.00	25.00	0.00	35.20	0.00
4.80	0.00	15.00	0.00	25.20	0.00	35.40	0.00
5.00	0.00	15.20	0.00	25.40	0.00	35.60	0.00
5.20	0.00	15.40	0.00	25.60	0.00	35.80	0.00
5.40	0.00	15.60	0.00	25.80	0.00	36.00	0.00
5.60	0.00	15.80	0.00	26.00	0.00		
5.80	0.00	16.00	0.00	26.20	0.00		
6.00	0.00	16.20	0.00	26.40	0.00		
6.20	0.00	16.40	0.00	26.60	0.00		
6.40	0.00	16.60	0.00	26.80	0.00		
6.60	0.00	16.80	0.00	27.00	0.00		
6.80	0.00	17.00	0.00	27.20	0.00		
7.00	0.00	17.20	0.00	27.40	0.00		
7.20	0.00	17.40	0.00	27.60	0.00		
7.40	0.00	17.60	0.00	27.80	0.00		
7.60	0.00	17.80	0.00	28.00	0.00		
7.80	0.00	18.00	0.00	28.20	0.00		
8.00	0.00	18.20	0.00	28.40	0.00		
8.20	0.00	18.40	0.00	28.60	0.00		
8.40	0.00	18.60	0.00	28.80	0.00		
8.60	0.00	18.80	0.00	29.00	0.00		
8.80	0.00	19.00	0.00	29.20	0.00		
9.00	0.00	19.20	0.00	29.40	0.00		
9.20	0.00	19.40	0.00	29.60	0.00		
9.40	0.00	19.60	0.00	29.80	0.00		
9.60	0.00	19.80	0.00	30.00	0.00		
9.80	0.00	20.00	0.00	30.20	0.00		
10.00	0.00	20.20	0.00	30.40	0.00		

Summary for Pond 3P: (new Pond)

Inflow Area = 23.600 ac, 0.00% Impervious, Inflow Depth = 1.12" for 25-Year event
 Inflow = 99.21 cfs @ 0.27 hrs, Volume= 2.210 af
 Outflow = 33.35 cfs @ 0.44 hrs, Volume= 2.210 af, Atten= 66% Lag= 10.6 min
 Primary = 33.35 cfs @ 0.44 hrs, Volume= 2.210 af

Routing by Stor-Ind method, Time Span= 0.00-36.00 hrs, dt= 0.01 hrs
 Peak Elev= 992.00' @ 0.44 hrs Surf.Area= 18,882 sf Storage= 56,920 cf

Plug-Flow detention time=19.5 min calculated for 2.210 af (100% of inflow)
 Center-of-Mass det. time=19.6 min (35.6 - 16.0)

Volume	Invert	Avail.Storage	Storage Description
#1	988.00'	123,172 cf	Custom Stage Data (Irregular) Listed below (Recalc)

Elevation (feet)	Surf.Area (sq-ft)	Perim. (feet)	Inc.Store (cubic-feet)	Cum.Store (cubic-feet)	Wet.Area (sq-ft)
988.00	7,354	425.0	0	0	7,354
989.00	12,425	660.5	9,779	9,779	27,704
990.00	14,533	669.0	13,465	23,245	28,822
991.00	16,909	681.0	15,706	38,951	30,278
992.00	18,873	693.0	17,882	56,833	31,759
993.00	20,959	717.0	19,907	76,739	34,542
994.00	23,154	738.0	22,047	98,787	37,080
995.00	25,637	765.0	24,385	123,172	40,396

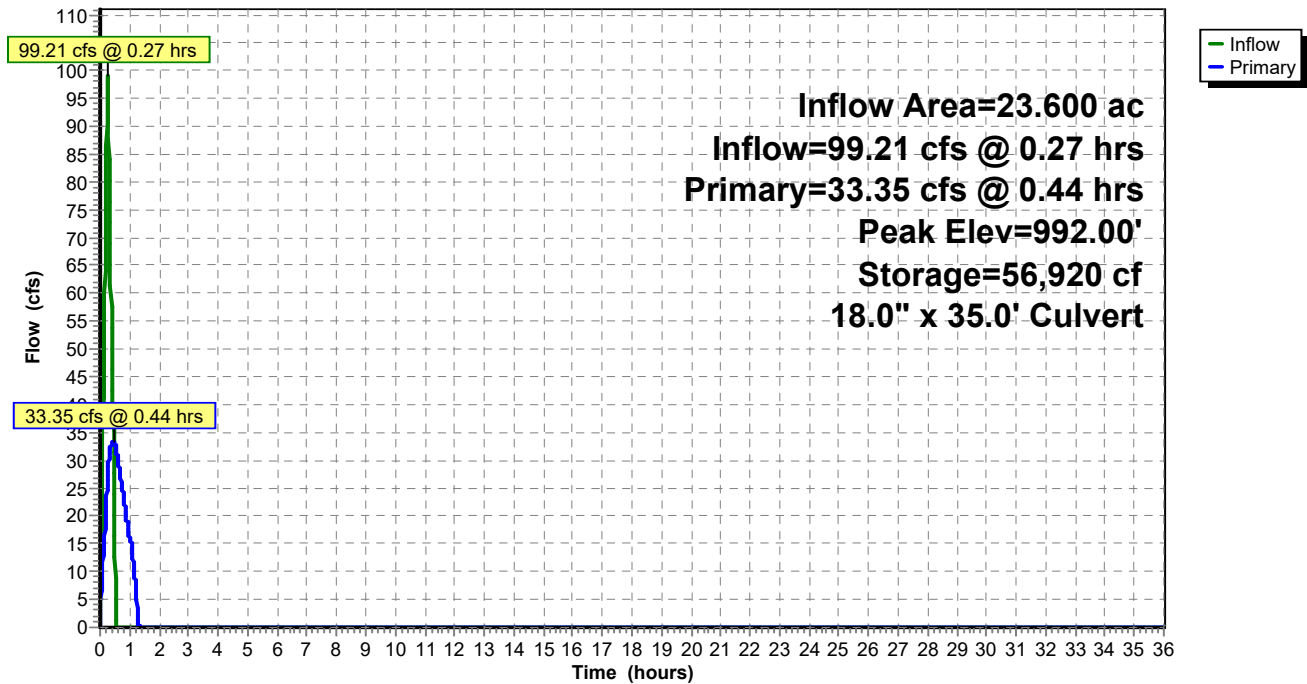
Device	Routing	Invert	Outlet Devices
#1	Primary	987.10'	18.0" x 35.0' long Culvert X 2.00 Box, 30-75° wingwalls, rounded crown, Ke= 0.200 Outlet Invert= 986.75' S= 0.0100 '/' Cc= 0.900 n= 0.020 Corrugated PE, corrugated interior

Primary OutFlow Max=33.35 cfs @ 0.44 hrs HW=992.00' (Free Discharge)

↑ **1=Culvert** (Barrel Controls 33.35 cfs @ 9.44 fps)

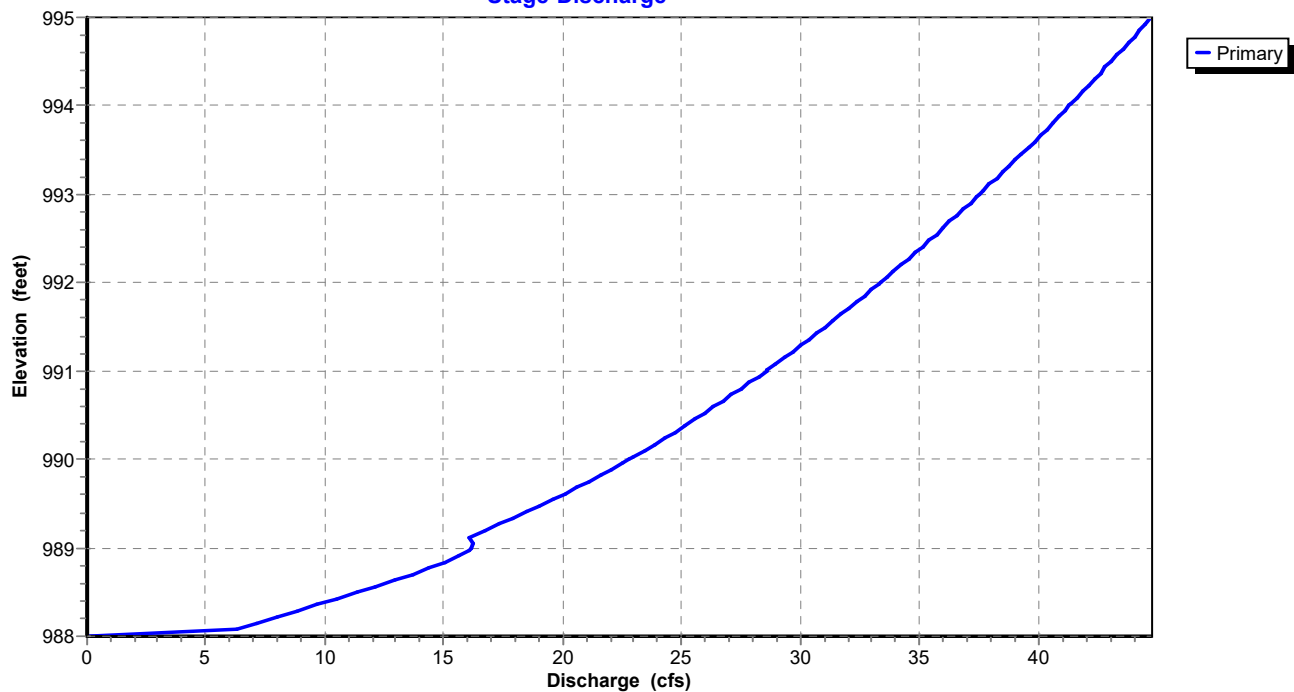
Pond 3P: (new Pond)

Hydrograph



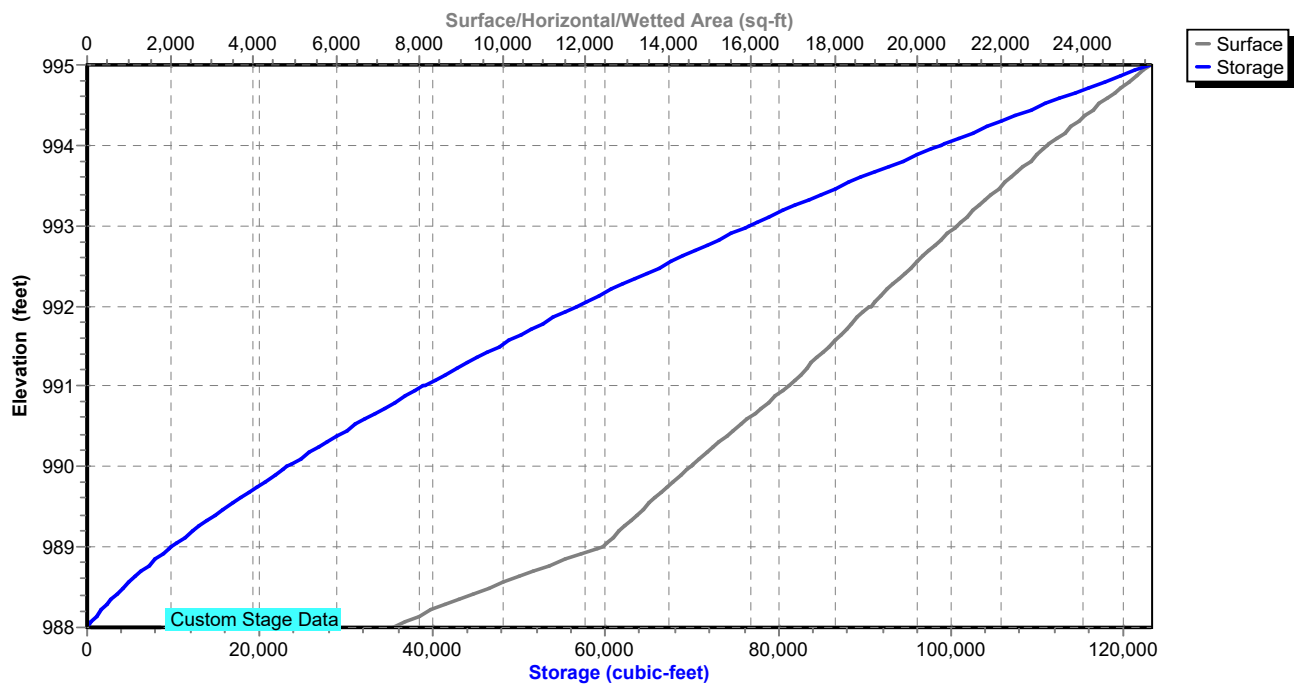
Pond 3P: (new Pond)

Stage-Discharge



Pond 3P: (new Pond)

Stage-Area-Storage



Hydrograph for Pond 3P: (new Pond)

Time (hours)	Inflow (cfs)	Storage (cubic-feet)	Elevation (feet)	Primary (cfs)
0.00	0.00	0	988.00	0.00
1.00	0.00	10,734	989.08	16.16
2.00	0.00	0	988.00	0.00
3.00	0.00	0	988.00	0.00
4.00	0.00	0	988.00	0.00
5.00	0.00	0	988.00	0.00
6.00	0.00	0	988.00	0.00
7.00	0.00	0	988.00	0.00
8.00	0.00	0	988.00	0.00
9.00	0.00	0	988.00	0.00
10.00	0.00	0	988.00	0.00
11.00	0.00	0	988.00	0.00
12.00	0.00	0	988.00	0.00
13.00	0.00	0	988.00	0.00
14.00	0.00	0	988.00	0.00
15.00	0.00	0	988.00	0.00
16.00	0.00	0	988.00	0.00
17.00	0.00	0	988.00	0.00
18.00	0.00	0	988.00	0.00
19.00	0.00	0	988.00	0.00
20.00	0.00	0	988.00	0.00
21.00	0.00	0	988.00	0.00
22.00	0.00	0	988.00	0.00
23.00	0.00	0	988.00	0.00
24.00	0.00	0	988.00	0.00
25.00	0.00	0	988.00	0.00
26.00	0.00	0	988.00	0.00
27.00	0.00	0	988.00	0.00
28.00	0.00	0	988.00	0.00
29.00	0.00	0	988.00	0.00
30.00	0.00	0	988.00	0.00
31.00	0.00	0	988.00	0.00
32.00	0.00	0	988.00	0.00
33.00	0.00	0	988.00	0.00
34.00	0.00	0	988.00	0.00
35.00	0.00	0	988.00	0.00
36.00	0.00	0	988.00	0.00

Stage-Discharge for Pond 3P: (new Pond)

Elevation (feet)	Primary (cfs)	Elevation (feet)	Primary (cfs)	Elevation (feet)	Primary (cfs)	Elevation (feet)	Primary (cfs)
988.00	0.00	990.04	23.03	992.08	33.69	994.12	41.70
988.04	5.99	990.08	23.29	992.12	33.86	994.16	41.85
988.08	6.44	990.12	23.54	992.16	34.04	994.20	41.99
988.12	6.90	990.16	23.79	992.20	34.21	994.24	42.13
988.16	7.36	990.20	24.04	992.24	34.38	994.28	42.27
988.20	7.83	990.24	24.28	992.28	34.56	994.32	42.41
988.24	8.31	990.28	24.53	992.32	34.73	994.36	42.55
988.28	8.79	990.32	24.77	992.36	34.90	994.40	42.69
988.32	9.27	990.36	25.00	992.40	35.07	994.44	42.83
988.36	9.75	990.40	25.24	992.44	35.23	994.48	42.96
988.40	10.24	990.44	25.47	992.48	35.40	994.52	43.10
988.44	10.72	990.48	25.70	992.52	35.57	994.56	43.24
988.48	11.20	990.52	25.93	992.56	35.74	994.60	43.38
988.52	11.67	990.56	26.16	992.60	35.90	994.64	43.51
988.56	12.14	990.60	26.39	992.64	36.07	994.68	43.65
988.60	12.60	990.64	26.61	992.68	36.23	994.72	43.78
988.64	13.04	990.68	26.83	992.72	36.39	994.76	43.92
988.68	13.48	990.72	27.05	992.76	36.56	994.80	44.05
988.72	13.90	990.76	27.27	992.80	36.72	994.84	44.19
988.76	14.31	990.80	27.49	992.84	36.88	994.88	44.32
988.80	14.69	990.84	27.70	992.88	37.04	994.92	44.46
988.84	15.05	990.88	27.92	992.92	37.20	994.96	44.59
988.88	15.38	990.92	28.13	992.96	37.36	995.00	44.72
988.92	15.67	990.96	28.34	993.00	37.52		
988.96	15.92	991.00	28.54	993.04	37.67		
989.00	16.11	991.04	28.75	993.08	37.83		
989.04	16.21	991.08	28.96	993.12	37.99		
989.08	16.17	991.12	29.16	993.16	38.14		
989.12	16.06	991.16	29.36	993.20	38.30		
989.16	16.42	991.20	29.56	993.24	38.45		
989.20	16.78	991.24	29.76	993.28	38.61		
989.24	17.13	991.28	29.96	993.32	38.76		
989.28	17.47	991.32	30.16	993.36	38.91		
989.32	17.81	991.36	30.36	993.40	39.06		
989.36	18.14	991.40	30.55	993.44	39.21		
989.40	18.46	991.44	30.74	993.48	39.37		
989.44	18.78	991.48	30.94	993.52	39.52		
989.48	19.09	991.52	31.13	993.56	39.67		
989.52	19.40	991.56	31.32	993.60	39.81		
989.56	19.70	991.60	31.51	993.64	39.96		
989.60	20.00	991.64	31.69	993.68	40.11		
989.64	20.29	991.68	31.88	993.72	40.26		
989.68	20.58	991.72	32.06	993.76	40.41		
989.72	20.87	991.76	32.25	993.80	40.55		
989.76	21.15	991.80	32.43	993.84	40.70		
989.80	21.43	991.84	32.61	993.88	40.84		
989.84	21.71	991.88	32.80	993.92	40.99		
989.88	21.98	991.92	32.98	993.96	41.13		
989.92	22.24	991.96	33.15	994.00	41.28		
989.96	22.51	992.00	33.33	994.04	41.42		
990.00	22.77	992.04	33.51	994.08	41.56		

Stage-Area-Storage for Pond 3P: (new Pond)

Elevation (feet)	Surface (sq-ft)	Storage (cubic-feet)	Elevation (feet)	Surface (sq-ft)	Storage (cubic-feet)
988.00	7,354	0	993.10	21,174	78,846
988.10	7,802	758	993.20	21,389	80,974
988.20	8,262	1,561	993.30	21,606	83,124
988.30	8,736	2,411	993.40	21,824	85,295
988.40	9,224	3,308	993.50	22,043	87,489
988.50	9,724	4,256	993.60	22,263	89,704
988.60	10,238	5,254	993.70	22,484	91,941
988.70	10,765	6,304	993.80	22,706	94,201
988.80	11,305	7,407	993.90	22,930	96,483
988.90	11,858	8,565	994.00	23,154	98,787
989.00	12,425	9,779	994.10	23,397	101,114
989.10	12,628	11,032	994.20	23,640	103,466
989.20	12,833	12,305	994.30	23,886	105,843
989.30	13,040	13,599	994.40	24,132	108,243
989.40	13,248	14,913	994.50	24,380	110,669
989.50	13,458	16,248	994.60	24,629	113,119
989.60	13,670	17,605	994.70	24,879	115,595
989.70	13,883	18,982	994.80	25,130	118,095
989.80	14,098	20,382	994.90	25,383	120,621
989.90	14,315	21,802	995.00	25,637	123,172
990.00	14,533	23,245			
990.10	14,763	24,709			
990.20	14,994	26,197			
990.30	15,227	27,708			
990.40	15,462	29,243			
990.50	15,699	30,801			
990.60	15,937	32,382			
990.70	16,177	33,988			
990.80	16,419	35,618			
990.90	16,663	37,272			
991.00	16,909	38,951			
991.10	17,101	40,651			
991.20	17,293	42,371			
991.30	17,487	44,110			
991.40	17,682	45,868			
991.50	17,878	47,646			
991.60	18,074	49,444			
991.70	18,272	51,261			
991.80	18,472	53,098			
991.90	18,672	54,955			
992.00	18,873	56,833			
992.10	19,077	58,730			
992.20	19,281	60,648			
992.30	19,487	62,586			
992.40	19,694	64,545			
992.50	19,902	66,525			
992.60	20,111	68,526			
992.70	20,322	70,548			
992.80	20,533	72,590			
992.90	20,745	74,654			
993.00	20,959	76,739			

Summary for Subcatchment 1S: Post-Dev Drainage Area DA1

Runoff = 111.96 cfs @ 0.27 hrs, Volume= 2.494 af, Depth= 1.27"

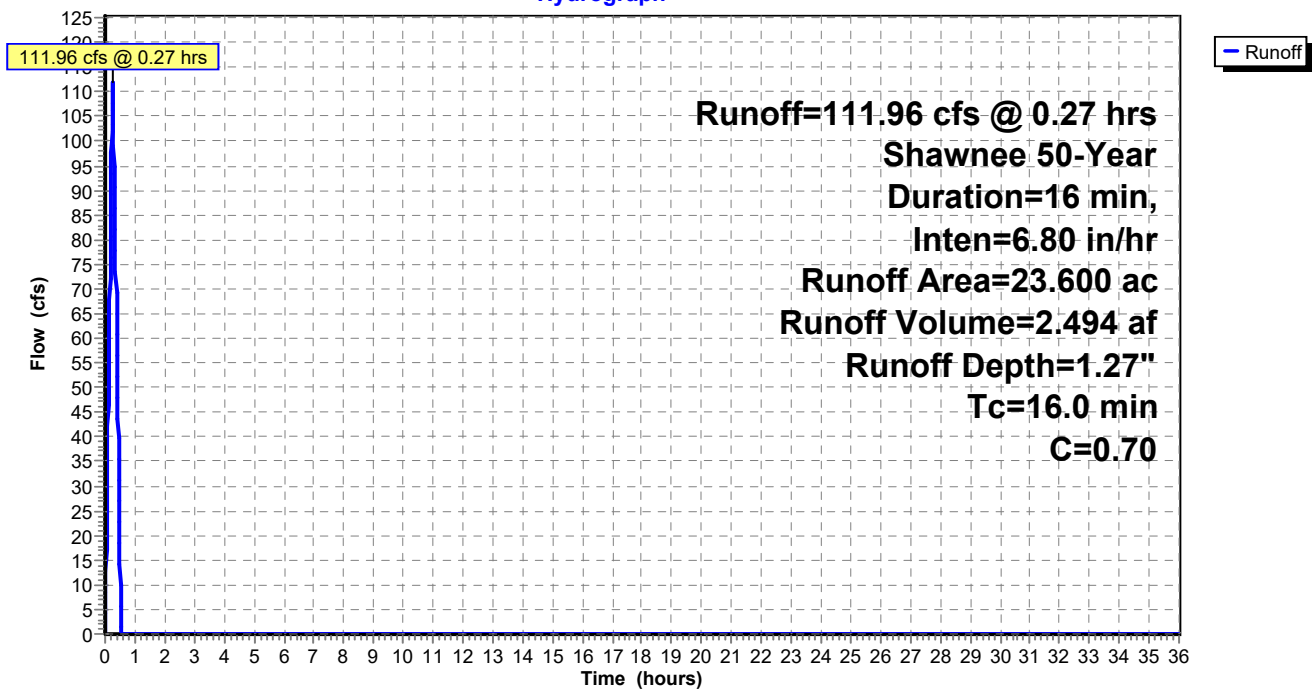
Runoff by Rational method, Rise/Fall=1.0/1.0 xTc, Time Span= 0.00-36.00 hrs, dt= 0.01 hrs
 Shawnee 50-Year Duration=16 min, Inten=6.80 in/hr

Area (ac)	C	Description
23.600	0.70	GRASS
23.600		Pervious Area

Tc (min)	Length (feet)	Slope (ft/ft)	Velocity (ft/sec)	Capacity (cfs)	Description
16.0					Direct Entry,

Subcatchment 1S: Post-Dev Drainage Area DA1

Hydrograph



Hydrograph for Subcatchment 1S: Post-Dev Drainage Area DA1

Time (hours)	Runoff (cfs)	Time (hours)	Runoff (cfs)	Time (hours)	Runoff (cfs)	Time (hours)	Runoff (cfs)
0.00	0.00	10.20	0.00	20.40	0.00	30.60	0.00
0.20	84.90	10.40	0.00	20.60	0.00	30.80	0.00
0.40	56.60	10.60	0.00	20.80	0.00	31.00	0.00
0.60	0.00	10.80	0.00	21.00	0.00	31.20	0.00
0.80	0.00	11.00	0.00	21.20	0.00	31.40	0.00
1.00	0.00	11.20	0.00	21.40	0.00	31.60	0.00
1.20	0.00	11.40	0.00	21.60	0.00	31.80	0.00
1.40	0.00	11.60	0.00	21.80	0.00	32.00	0.00
1.60	0.00	11.80	0.00	22.00	0.00	32.20	0.00
1.80	0.00	12.00	0.00	22.20	0.00	32.40	0.00
2.00	0.00	12.20	0.00	22.40	0.00	32.60	0.00
2.20	0.00	12.40	0.00	22.60	0.00	32.80	0.00
2.40	0.00	12.60	0.00	22.80	0.00	33.00	0.00
2.60	0.00	12.80	0.00	23.00	0.00	33.20	0.00
2.80	0.00	13.00	0.00	23.20	0.00	33.40	0.00
3.00	0.00	13.20	0.00	23.40	0.00	33.60	0.00
3.20	0.00	13.40	0.00	23.60	0.00	33.80	0.00
3.40	0.00	13.60	0.00	23.80	0.00	34.00	0.00
3.60	0.00	13.80	0.00	24.00	0.00	34.20	0.00
3.80	0.00	14.00	0.00	24.20	0.00	34.40	0.00
4.00	0.00	14.20	0.00	24.40	0.00	34.60	0.00
4.20	0.00	14.40	0.00	24.60	0.00	34.80	0.00
4.40	0.00	14.60	0.00	24.80	0.00	35.00	0.00
4.60	0.00	14.80	0.00	25.00	0.00	35.20	0.00
4.80	0.00	15.00	0.00	25.20	0.00	35.40	0.00
5.00	0.00	15.20	0.00	25.40	0.00	35.60	0.00
5.20	0.00	15.40	0.00	25.60	0.00	35.80	0.00
5.40	0.00	15.60	0.00	25.80	0.00	36.00	0.00
5.60	0.00	15.80	0.00	26.00	0.00		
5.80	0.00	16.00	0.00	26.20	0.00		
6.00	0.00	16.20	0.00	26.40	0.00		
6.20	0.00	16.40	0.00	26.60	0.00		
6.40	0.00	16.60	0.00	26.80	0.00		
6.60	0.00	16.80	0.00	27.00	0.00		
6.80	0.00	17.00	0.00	27.20	0.00		
7.00	0.00	17.20	0.00	27.40	0.00		
7.20	0.00	17.40	0.00	27.60	0.00		
7.40	0.00	17.60	0.00	27.80	0.00		
7.60	0.00	17.80	0.00	28.00	0.00		
7.80	0.00	18.00	0.00	28.20	0.00		
8.00	0.00	18.20	0.00	28.40	0.00		
8.20	0.00	18.40	0.00	28.60	0.00		
8.40	0.00	18.60	0.00	28.80	0.00		
8.60	0.00	18.80	0.00	29.00	0.00		
8.80	0.00	19.00	0.00	29.20	0.00		
9.00	0.00	19.20	0.00	29.40	0.00		
9.20	0.00	19.40	0.00	29.60	0.00		
9.40	0.00	19.60	0.00	29.80	0.00		
9.60	0.00	19.80	0.00	30.00	0.00		
9.80	0.00	20.00	0.00	30.20	0.00		
10.00	0.00	20.20	0.00	30.40	0.00		

Summary for Pond 3P: (new Pond)

Inflow Area = 23.600 ac, 0.00% Impervious, Inflow Depth = 1.27" for 50-Year event
 Inflow = 111.96 cfs @ 0.27 hrs, Volume= 2.494 af
 Outflow = 35.48 cfs @ 0.45 hrs, Volume= 2.494 af, Atten= 68% Lag= 10.9 min
 Primary = 35.48 cfs @ 0.45 hrs, Volume= 2.494 af

Routing by Stor-Ind method, Time Span= 0.00-36.00 hrs, dt= 0.01 hrs
 Peak Elev= 992.50' @ 0.45 hrs Surf.Area= 19,900 sf Storage= 66,498 cf

Plug-Flow detention time=21.3 min calculated for 2.494 af (100% of inflow)
 Center-of-Mass det. time=21.3 min (37.3 - 16.0)

Volume	Invert	Avail.Storage	Storage Description
#1	988.00'	123,172 cf	Custom Stage Data (Irregular) Listed below (Recalc)

Elevation (feet)	Surf.Area (sq-ft)	Perim. (feet)	Inc.Store (cubic-feet)	Cum.Store (cubic-feet)	Wet.Area (sq-ft)
988.00	7,354	425.0	0	0	7,354
989.00	12,425	660.5	9,779	9,779	27,704
990.00	14,533	669.0	13,465	23,245	28,822
991.00	16,909	681.0	15,706	38,951	30,278
992.00	18,873	693.0	17,882	56,833	31,759
993.00	20,959	717.0	19,907	76,739	34,542
994.00	23,154	738.0	22,047	98,787	37,080
995.00	25,637	765.0	24,385	123,172	40,396

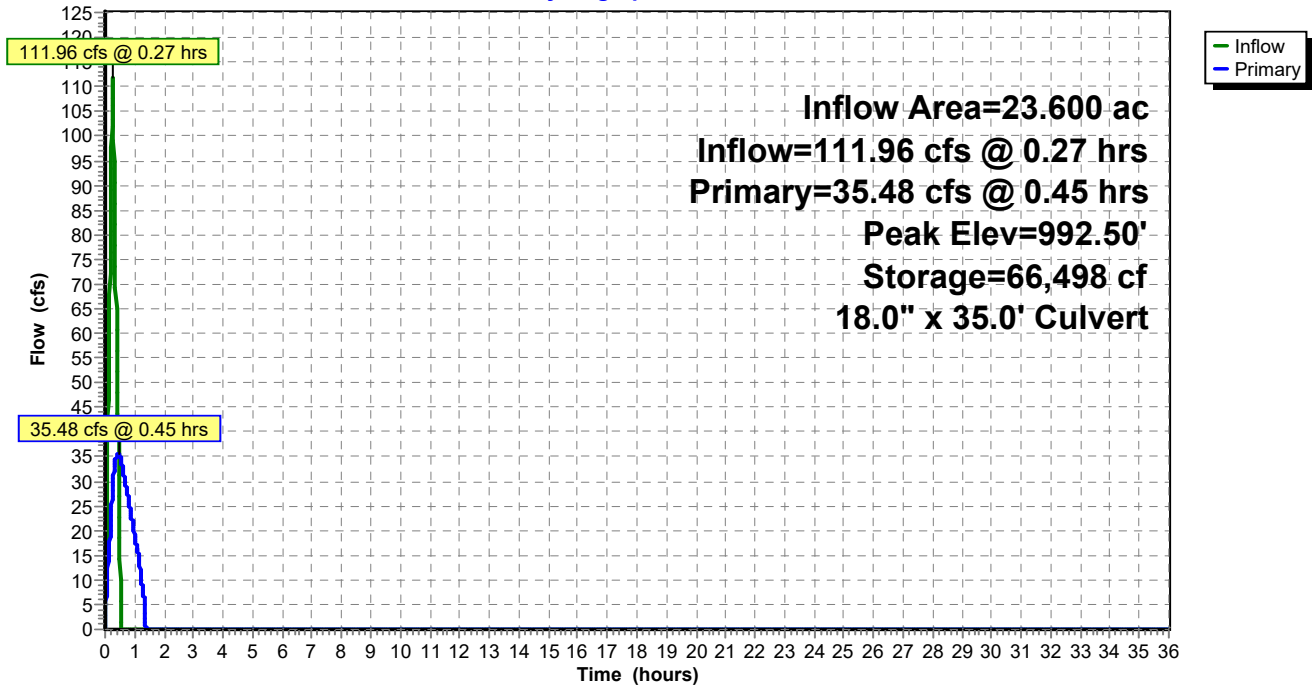
Device	Routing	Invert	Outlet Devices
#1	Primary	987.10'	18.0" x 35.0' long Culvert X 2.00 Box, 30-75° wingwalls, rounded crown, Ke= 0.200 Outlet Invert= 986.75' S= 0.0100 '/' Cc= 0.900 n= 0.020 Corrugated PE, corrugated interior

Primary OutFlow Max=35.48 cfs @ 0.45 hrs HW=992.50' (Free Discharge)

↑ **1=Culvert** (Barrel Controls 35.48 cfs @ 10.04 fps)

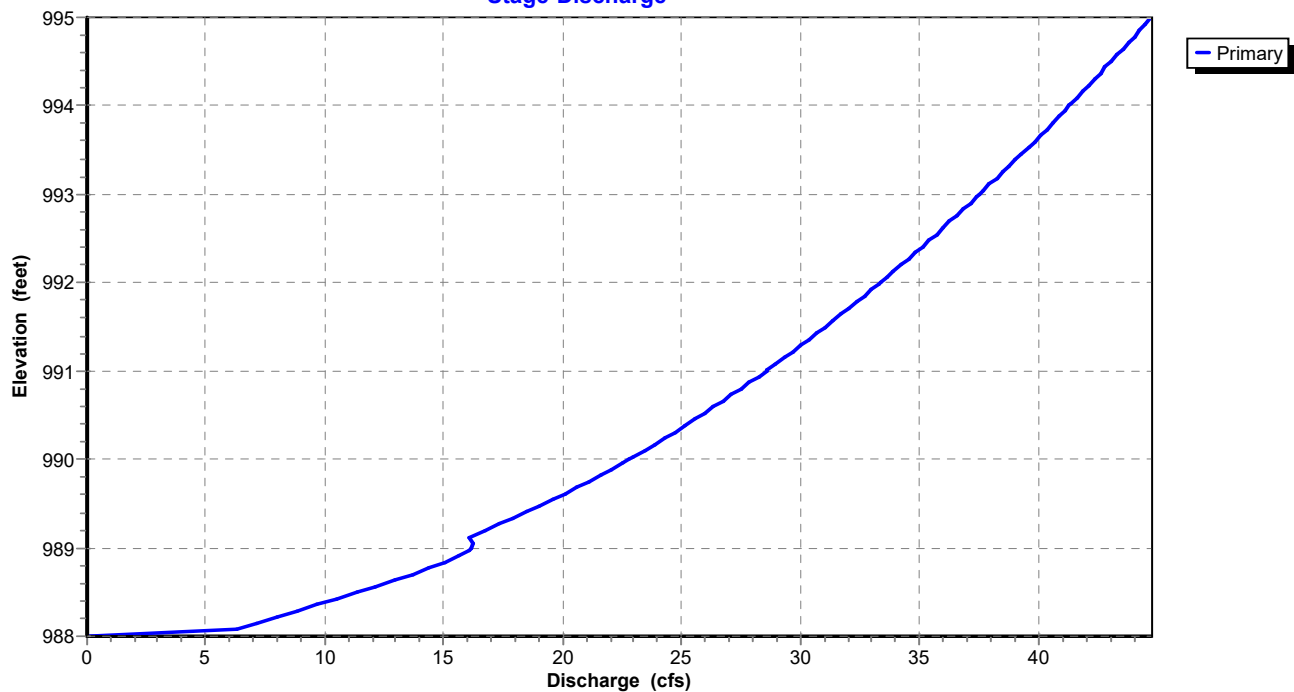
Pond 3P: (new Pond)

Hydrograph



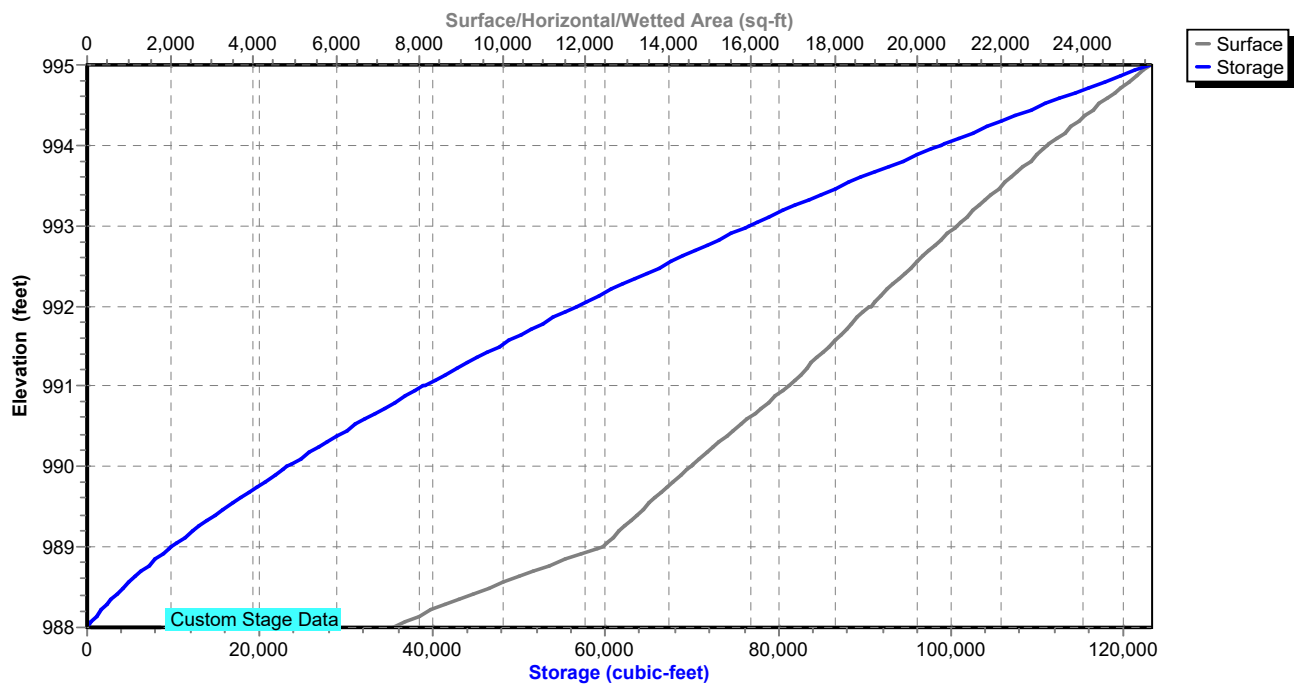
Pond 3P: (new Pond)

Stage-Discharge



Pond 3P: (new Pond)

Stage-Area-Storage



Hydrograph for Pond 3P: (new Pond)

Time (hours)	Inflow (cfs)	Storage (cubic-feet)	Elevation (feet)	Primary (cfs)
0.00	0.00	0	988.00	0.00
1.00	0.00	15,715	989.46	18.93
2.00	0.00	0	988.00	0.00
3.00	0.00	0	988.00	0.00
4.00	0.00	0	988.00	0.00
5.00	0.00	0	988.00	0.00
6.00	0.00	0	988.00	0.00
7.00	0.00	0	988.00	0.00
8.00	0.00	0	988.00	0.00
9.00	0.00	0	988.00	0.00
10.00	0.00	0	988.00	0.00
11.00	0.00	0	988.00	0.00
12.00	0.00	0	988.00	0.00
13.00	0.00	0	988.00	0.00
14.00	0.00	0	988.00	0.00
15.00	0.00	0	988.00	0.00
16.00	0.00	0	988.00	0.00
17.00	0.00	0	988.00	0.00
18.00	0.00	0	988.00	0.00
19.00	0.00	0	988.00	0.00
20.00	0.00	0	988.00	0.00
21.00	0.00	0	988.00	0.00
22.00	0.00	0	988.00	0.00
23.00	0.00	0	988.00	0.00
24.00	0.00	0	988.00	0.00
25.00	0.00	0	988.00	0.00
26.00	0.00	0	988.00	0.00
27.00	0.00	0	988.00	0.00
28.00	0.00	0	988.00	0.00
29.00	0.00	0	988.00	0.00
30.00	0.00	0	988.00	0.00
31.00	0.00	0	988.00	0.00
32.00	0.00	0	988.00	0.00
33.00	0.00	0	988.00	0.00
34.00	0.00	0	988.00	0.00
35.00	0.00	0	988.00	0.00
36.00	0.00	0	988.00	0.00

Stage-Discharge for Pond 3P: (new Pond)

Elevation (feet)	Primary (cfs)	Elevation (feet)	Primary (cfs)	Elevation (feet)	Primary (cfs)	Elevation (feet)	Primary (cfs)
988.00	0.00	990.04	23.03	992.08	33.69	994.12	41.70
988.04	5.99	990.08	23.29	992.12	33.86	994.16	41.85
988.08	6.44	990.12	23.54	992.16	34.04	994.20	41.99
988.12	6.90	990.16	23.79	992.20	34.21	994.24	42.13
988.16	7.36	990.20	24.04	992.24	34.38	994.28	42.27
988.20	7.83	990.24	24.28	992.28	34.56	994.32	42.41
988.24	8.31	990.28	24.53	992.32	34.73	994.36	42.55
988.28	8.79	990.32	24.77	992.36	34.90	994.40	42.69
988.32	9.27	990.36	25.00	992.40	35.07	994.44	42.83
988.36	9.75	990.40	25.24	992.44	35.23	994.48	42.96
988.40	10.24	990.44	25.47	992.48	35.40	994.52	43.10
988.44	10.72	990.48	25.70	992.52	35.57	994.56	43.24
988.48	11.20	990.52	25.93	992.56	35.74	994.60	43.38
988.52	11.67	990.56	26.16	992.60	35.90	994.64	43.51
988.56	12.14	990.60	26.39	992.64	36.07	994.68	43.65
988.60	12.60	990.64	26.61	992.68	36.23	994.72	43.78
988.64	13.04	990.68	26.83	992.72	36.39	994.76	43.92
988.68	13.48	990.72	27.05	992.76	36.56	994.80	44.05
988.72	13.90	990.76	27.27	992.80	36.72	994.84	44.19
988.76	14.31	990.80	27.49	992.84	36.88	994.88	44.32
988.80	14.69	990.84	27.70	992.88	37.04	994.92	44.46
988.84	15.05	990.88	27.92	992.92	37.20	994.96	44.59
988.88	15.38	990.92	28.13	992.96	37.36	995.00	44.72
988.92	15.67	990.96	28.34	993.00	37.52		
988.96	15.92	991.00	28.54	993.04	37.67		
989.00	16.11	991.04	28.75	993.08	37.83		
989.04	16.21	991.08	28.96	993.12	37.99		
989.08	16.17	991.12	29.16	993.16	38.14		
989.12	16.06	991.16	29.36	993.20	38.30		
989.16	16.42	991.20	29.56	993.24	38.45		
989.20	16.78	991.24	29.76	993.28	38.61		
989.24	17.13	991.28	29.96	993.32	38.76		
989.28	17.47	991.32	30.16	993.36	38.91		
989.32	17.81	991.36	30.36	993.40	39.06		
989.36	18.14	991.40	30.55	993.44	39.21		
989.40	18.46	991.44	30.74	993.48	39.37		
989.44	18.78	991.48	30.94	993.52	39.52		
989.48	19.09	991.52	31.13	993.56	39.67		
989.52	19.40	991.56	31.32	993.60	39.81		
989.56	19.70	991.60	31.51	993.64	39.96		
989.60	20.00	991.64	31.69	993.68	40.11		
989.64	20.29	991.68	31.88	993.72	40.26		
989.68	20.58	991.72	32.06	993.76	40.41		
989.72	20.87	991.76	32.25	993.80	40.55		
989.76	21.15	991.80	32.43	993.84	40.70		
989.80	21.43	991.84	32.61	993.88	40.84		
989.84	21.71	991.88	32.80	993.92	40.99		
989.88	21.98	991.92	32.98	993.96	41.13		
989.92	22.24	991.96	33.15	994.00	41.28		
989.96	22.51	992.00	33.33	994.04	41.42		
990.00	22.77	992.04	33.51	994.08	41.56		

Stage-Area-Storage for Pond 3P: (new Pond)

Elevation (feet)	Surface (sq-ft)	Storage (cubic-feet)	Elevation (feet)	Surface (sq-ft)	Storage (cubic-feet)
988.00	7,354	0	993.10	21,174	78,846
988.10	7,802	758	993.20	21,389	80,974
988.20	8,262	1,561	993.30	21,606	83,124
988.30	8,736	2,411	993.40	21,824	85,295
988.40	9,224	3,308	993.50	22,043	87,489
988.50	9,724	4,256	993.60	22,263	89,704
988.60	10,238	5,254	993.70	22,484	91,941
988.70	10,765	6,304	993.80	22,706	94,201
988.80	11,305	7,407	993.90	22,930	96,483
988.90	11,858	8,565	994.00	23,154	98,787
989.00	12,425	9,779	994.10	23,397	101,114
989.10	12,628	11,032	994.20	23,640	103,466
989.20	12,833	12,305	994.30	23,886	105,843
989.30	13,040	13,599	994.40	24,132	108,243
989.40	13,248	14,913	994.50	24,380	110,669
989.50	13,458	16,248	994.60	24,629	113,119
989.60	13,670	17,605	994.70	24,879	115,595
989.70	13,883	18,982	994.80	25,130	118,095
989.80	14,098	20,382	994.90	25,383	120,621
989.90	14,315	21,802	995.00	25,637	123,172
990.00	14,533	23,245			
990.10	14,763	24,709			
990.20	14,994	26,197			
990.30	15,227	27,708			
990.40	15,462	29,243			
990.50	15,699	30,801			
990.60	15,937	32,382			
990.70	16,177	33,988			
990.80	16,419	35,618			
990.90	16,663	37,272			
991.00	16,909	38,951			
991.10	17,101	40,651			
991.20	17,293	42,371			
991.30	17,487	44,110			
991.40	17,682	45,868			
991.50	17,878	47,646			
991.60	18,074	49,444			
991.70	18,272	51,261			
991.80	18,472	53,098			
991.90	18,672	54,955			
992.00	18,873	56,833			
992.10	19,077	58,730			
992.20	19,281	60,648			
992.30	19,487	62,586			
992.40	19,694	64,545			
992.50	19,902	66,525			
992.60	20,111	68,526			
992.70	20,322	70,548			
992.80	20,533	72,590			
992.90	20,745	74,654			
993.00	20,959	76,739			

Summary for Subcatchment 1S: Post-Dev Drainage Area DA1

Runoff = 122.52 cfs @ 0.27 hrs, Volume= 2.730 af, Depth= 1.39"

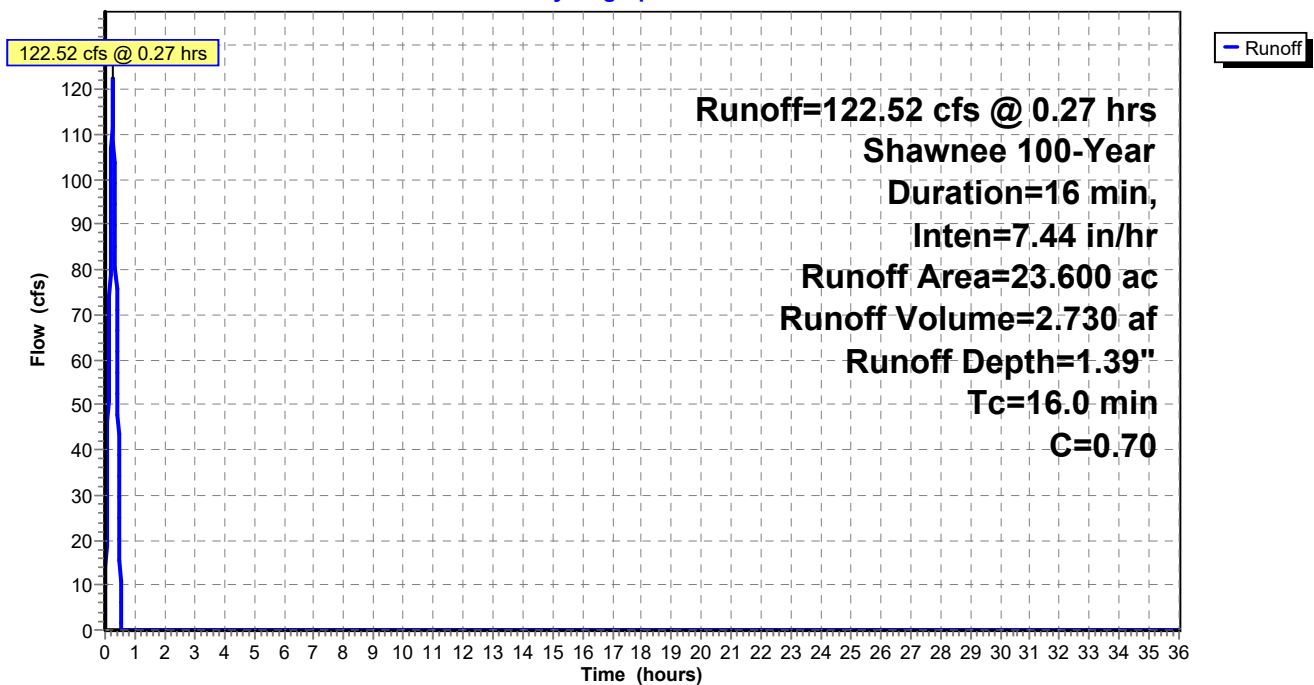
Runoff by Rational method, Rise/Fall=1.0/1.0 xTc, Time Span= 0.00-36.00 hrs, dt= 0.01 hrs
Shawnee 100-Year Duration=16 min, Inten=7.44 in/hr

Area (ac)	C	Description
23.600	0.70	GRASS
23.600		Pervious Area

Tc (min)	Length (feet)	Slope (ft/ft)	Velocity (ft/sec)	Capacity (cfs)	Description
16.0					Direct Entry,

Subcatchment 1S: Post-Dev Drainage Area DA1

Hydrograph



Hydrograph for Subcatchment 1S: Post-Dev Drainage Area DA1

Time (hours)	Runoff (cfs)	Time (hours)	Runoff (cfs)	Time (hours)	Runoff (cfs)	Time (hours)	Runoff (cfs)
0.00	0.00	10.20	0.00	20.40	0.00	30.60	0.00
0.20	92.91	10.40	0.00	20.60	0.00	30.80	0.00
0.40	61.94	10.60	0.00	20.80	0.00	31.00	0.00
0.60	0.00	10.80	0.00	21.00	0.00	31.20	0.00
0.80	0.00	11.00	0.00	21.20	0.00	31.40	0.00
1.00	0.00	11.20	0.00	21.40	0.00	31.60	0.00
1.20	0.00	11.40	0.00	21.60	0.00	31.80	0.00
1.40	0.00	11.60	0.00	21.80	0.00	32.00	0.00
1.60	0.00	11.80	0.00	22.00	0.00	32.20	0.00
1.80	0.00	12.00	0.00	22.20	0.00	32.40	0.00
2.00	0.00	12.20	0.00	22.40	0.00	32.60	0.00
2.20	0.00	12.40	0.00	22.60	0.00	32.80	0.00
2.40	0.00	12.60	0.00	22.80	0.00	33.00	0.00
2.60	0.00	12.80	0.00	23.00	0.00	33.20	0.00
2.80	0.00	13.00	0.00	23.20	0.00	33.40	0.00
3.00	0.00	13.20	0.00	23.40	0.00	33.60	0.00
3.20	0.00	13.40	0.00	23.60	0.00	33.80	0.00
3.40	0.00	13.60	0.00	23.80	0.00	34.00	0.00
3.60	0.00	13.80	0.00	24.00	0.00	34.20	0.00
3.80	0.00	14.00	0.00	24.20	0.00	34.40	0.00
4.00	0.00	14.20	0.00	24.40	0.00	34.60	0.00
4.20	0.00	14.40	0.00	24.60	0.00	34.80	0.00
4.40	0.00	14.60	0.00	24.80	0.00	35.00	0.00
4.60	0.00	14.80	0.00	25.00	0.00	35.20	0.00
4.80	0.00	15.00	0.00	25.20	0.00	35.40	0.00
5.00	0.00	15.20	0.00	25.40	0.00	35.60	0.00
5.20	0.00	15.40	0.00	25.60	0.00	35.80	0.00
5.40	0.00	15.60	0.00	25.80	0.00	36.00	0.00
5.60	0.00	15.80	0.00	26.00	0.00		
5.80	0.00	16.00	0.00	26.20	0.00		
6.00	0.00	16.20	0.00	26.40	0.00		
6.20	0.00	16.40	0.00	26.60	0.00		
6.40	0.00	16.60	0.00	26.80	0.00		
6.60	0.00	16.80	0.00	27.00	0.00		
6.80	0.00	17.00	0.00	27.20	0.00		
7.00	0.00	17.20	0.00	27.40	0.00		
7.20	0.00	17.40	0.00	27.60	0.00		
7.40	0.00	17.60	0.00	27.80	0.00		
7.60	0.00	17.80	0.00	28.00	0.00		
7.80	0.00	18.00	0.00	28.20	0.00		
8.00	0.00	18.20	0.00	28.40	0.00		
8.20	0.00	18.40	0.00	28.60	0.00		
8.40	0.00	18.60	0.00	28.80	0.00		
8.60	0.00	18.80	0.00	29.00	0.00		
8.80	0.00	19.00	0.00	29.20	0.00		
9.00	0.00	19.20	0.00	29.40	0.00		
9.20	0.00	19.40	0.00	29.60	0.00		
9.40	0.00	19.60	0.00	29.80	0.00		
9.60	0.00	19.80	0.00	30.00	0.00		
9.80	0.00	20.00	0.00	30.20	0.00		
10.00	0.00	20.20	0.00	30.40	0.00		

Summary for Pond 3P: (new Pond)

Inflow Area = 23.600 ac, 0.00% Impervious, Inflow Depth = 1.39" for 100-Year event
 Inflow = 122.52 cfs @ 0.27 hrs, Volume= 2.730 af
 Outflow = 37.11 cfs @ 0.45 hrs, Volume= 2.730 af, Atten= 70% Lag= 11.2 min
 Primary = 37.11 cfs @ 0.45 hrs, Volume= 2.730 af

Routing by Stor-Ind method, Time Span= 0.00-36.00 hrs, dt= 0.01 hrs
 Peak Elev= 992.90' @ 0.45 hrs Surf.Area= 20,739 sf Storage= 74,588 cf

Plug-Flow detention time=22.7 min calculated for 2.729 af (100% of inflow)
 Center-of-Mass det. time=22.7 min (38.7 - 16.0)

Volume	Invert	Avail.Storage	Storage Description		
#1	988.00'	123,172 cf	Custom Stage Data (Irregular) Listed below (Recalc)		
Elevation (feet)	Surf.Area (sq-ft)	Perim. (feet)	Inc.Store (cubic-feet)	Cum.Store (cubic-feet)	Wet.Area (sq-ft)
988.00	7,354	425.0	0	0	7,354
989.00	12,425	660.5	9,779	9,779	27,704
990.00	14,533	669.0	13,465	23,245	28,822
991.00	16,909	681.0	15,706	38,951	30,278
992.00	18,873	693.0	17,882	56,833	31,759
993.00	20,959	717.0	19,907	76,739	34,542
994.00	23,154	738.0	22,047	98,787	37,080
995.00	25,637	765.0	24,385	123,172	40,396

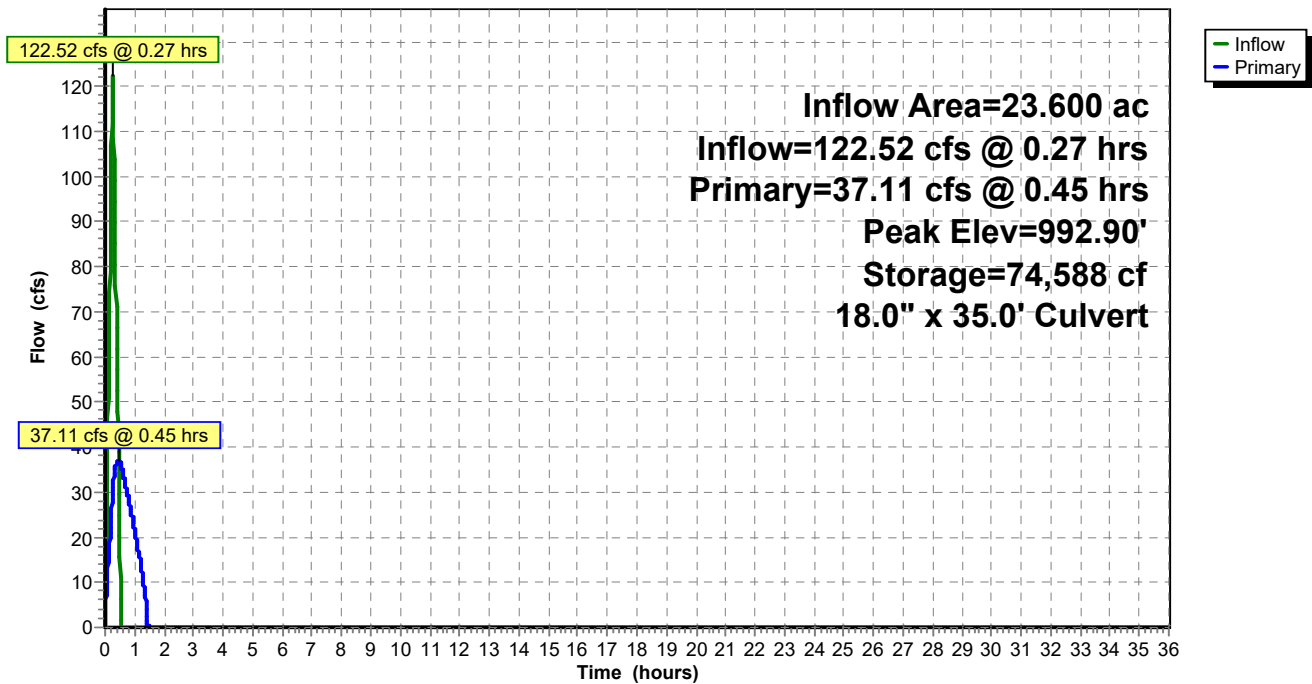
Device	Routing	Invert	Outlet Devices
#1	Primary	987.10'	18.0" x 35.0' long Culvert X 2.00 Box, 30-75° wingwalls, rounded crown, Ke= 0.200 Outlet Invert= 986.75' S= 0.0100 '/' Cc= 0.900 n= 0.020 Corrugated PE, corrugated interior

Primary OutFlow Max=37.10 cfs @ 0.45 hrs HW=992.90' (Free Discharge)

↑ **1=Culvert** (Barrel Controls 37.10 cfs @ 10.50 fps)

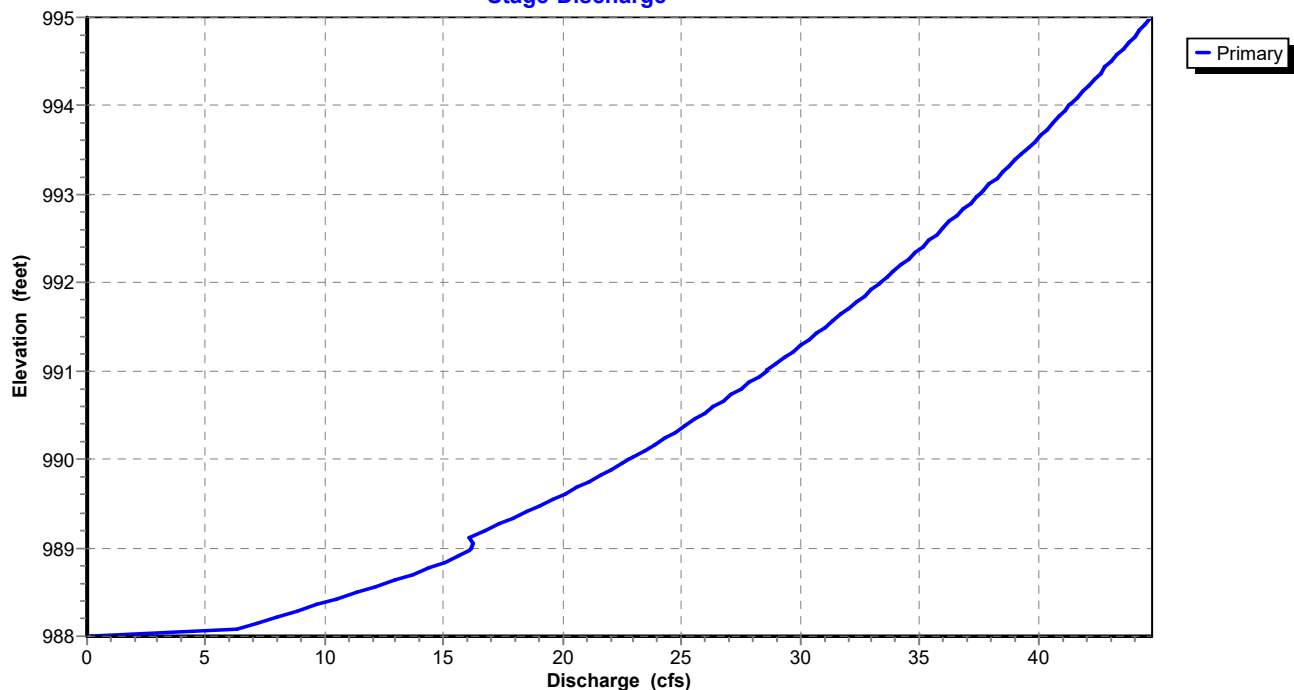
Pond 3P: (new Pond)

Hydrograph



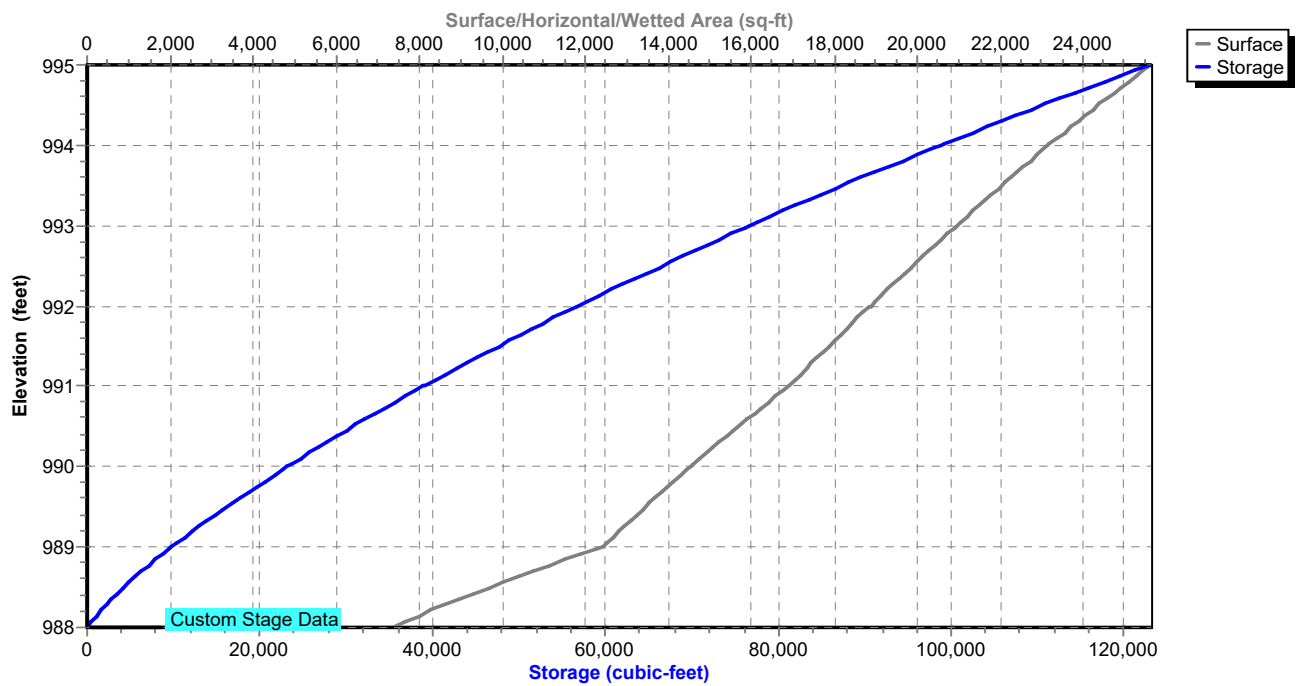
Pond 3P: (new Pond)

Stage-Discharge



Pond 3P: (new Pond)

Stage-Area-Storage



Hydrograph for Pond 3P: (new Pond)

Time (hours)	Inflow (cfs)	Storage (cubic-feet)	Elevation (feet)	Primary (cfs)
0.00	0.00	0	988.00	0.00
1.00	0.00	20,345	989.80	21.41
2.00	0.00	0	988.00	0.00
3.00	0.00	0	988.00	0.00
4.00	0.00	0	988.00	0.00
5.00	0.00	0	988.00	0.00
6.00	0.00	0	988.00	0.00
7.00	0.00	0	988.00	0.00
8.00	0.00	0	988.00	0.00
9.00	0.00	0	988.00	0.00
10.00	0.00	0	988.00	0.00
11.00	0.00	0	988.00	0.00
12.00	0.00	0	988.00	0.00
13.00	0.00	0	988.00	0.00
14.00	0.00	0	988.00	0.00
15.00	0.00	0	988.00	0.00
16.00	0.00	0	988.00	0.00
17.00	0.00	0	988.00	0.00
18.00	0.00	0	988.00	0.00
19.00	0.00	0	988.00	0.00
20.00	0.00	0	988.00	0.00
21.00	0.00	0	988.00	0.00
22.00	0.00	0	988.00	0.00
23.00	0.00	0	988.00	0.00
24.00	0.00	0	988.00	0.00
25.00	0.00	0	988.00	0.00
26.00	0.00	0	988.00	0.00
27.00	0.00	0	988.00	0.00
28.00	0.00	0	988.00	0.00
29.00	0.00	0	988.00	0.00
30.00	0.00	0	988.00	0.00
31.00	0.00	0	988.00	0.00
32.00	0.00	0	988.00	0.00
33.00	0.00	0	988.00	0.00
34.00	0.00	0	988.00	0.00
35.00	0.00	0	988.00	0.00
36.00	0.00	0	988.00	0.00

Stage-Discharge for Pond 3P: (new Pond)

Elevation (feet)	Primary (cfs)	Elevation (feet)	Primary (cfs)	Elevation (feet)	Primary (cfs)	Elevation (feet)	Primary (cfs)
988.00	0.00	990.04	23.03	992.08	33.69	994.12	41.70
988.04	5.99	990.08	23.29	992.12	33.86	994.16	41.85
988.08	6.44	990.12	23.54	992.16	34.04	994.20	41.99
988.12	6.90	990.16	23.79	992.20	34.21	994.24	42.13
988.16	7.36	990.20	24.04	992.24	34.38	994.28	42.27
988.20	7.83	990.24	24.28	992.28	34.56	994.32	42.41
988.24	8.31	990.28	24.53	992.32	34.73	994.36	42.55
988.28	8.79	990.32	24.77	992.36	34.90	994.40	42.69
988.32	9.27	990.36	25.00	992.40	35.07	994.44	42.83
988.36	9.75	990.40	25.24	992.44	35.23	994.48	42.96
988.40	10.24	990.44	25.47	992.48	35.40	994.52	43.10
988.44	10.72	990.48	25.70	992.52	35.57	994.56	43.24
988.48	11.20	990.52	25.93	992.56	35.74	994.60	43.38
988.52	11.67	990.56	26.16	992.60	35.90	994.64	43.51
988.56	12.14	990.60	26.39	992.64	36.07	994.68	43.65
988.60	12.60	990.64	26.61	992.68	36.23	994.72	43.78
988.64	13.04	990.68	26.83	992.72	36.39	994.76	43.92
988.68	13.48	990.72	27.05	992.76	36.56	994.80	44.05
988.72	13.90	990.76	27.27	992.80	36.72	994.84	44.19
988.76	14.31	990.80	27.49	992.84	36.88	994.88	44.32
988.80	14.69	990.84	27.70	992.88	37.04	994.92	44.46
988.84	15.05	990.88	27.92	992.92	37.20	994.96	44.59
988.88	15.38	990.92	28.13	992.96	37.36	995.00	44.72
988.92	15.67	990.96	28.34	993.00	37.52		
988.96	15.92	991.00	28.54	993.04	37.67		
989.00	16.11	991.04	28.75	993.08	37.83		
989.04	16.21	991.08	28.96	993.12	37.99		
989.08	16.17	991.12	29.16	993.16	38.14		
989.12	16.06	991.16	29.36	993.20	38.30		
989.16	16.42	991.20	29.56	993.24	38.45		
989.20	16.78	991.24	29.76	993.28	38.61		
989.24	17.13	991.28	29.96	993.32	38.76		
989.28	17.47	991.32	30.16	993.36	38.91		
989.32	17.81	991.36	30.36	993.40	39.06		
989.36	18.14	991.40	30.55	993.44	39.21		
989.40	18.46	991.44	30.74	993.48	39.37		
989.44	18.78	991.48	30.94	993.52	39.52		
989.48	19.09	991.52	31.13	993.56	39.67		
989.52	19.40	991.56	31.32	993.60	39.81		
989.56	19.70	991.60	31.51	993.64	39.96		
989.60	20.00	991.64	31.69	993.68	40.11		
989.64	20.29	991.68	31.88	993.72	40.26		
989.68	20.58	991.72	32.06	993.76	40.41		
989.72	20.87	991.76	32.25	993.80	40.55		
989.76	21.15	991.80	32.43	993.84	40.70		
989.80	21.43	991.84	32.61	993.88	40.84		
989.84	21.71	991.88	32.80	993.92	40.99		
989.88	21.98	991.92	32.98	993.96	41.13		
989.92	22.24	991.96	33.15	994.00	41.28		
989.96	22.51	992.00	33.33	994.04	41.42		
990.00	22.77	992.04	33.51	994.08	41.56		

Stage-Area-Storage for Pond 3P: (new Pond)

Elevation (feet)	Surface (sq-ft)	Storage (cubic-feet)	Elevation (feet)	Surface (sq-ft)	Storage (cubic-feet)
988.00	7,354	0	993.10	21,174	78,846
988.10	7,802	758	993.20	21,389	80,974
988.20	8,262	1,561	993.30	21,606	83,124
988.30	8,736	2,411	993.40	21,824	85,295
988.40	9,224	3,308	993.50	22,043	87,489
988.50	9,724	4,256	993.60	22,263	89,704
988.60	10,238	5,254	993.70	22,484	91,941
988.70	10,765	6,304	993.80	22,706	94,201
988.80	11,305	7,407	993.90	22,930	96,483
988.90	11,858	8,565	994.00	23,154	98,787
989.00	12,425	9,779	994.10	23,397	101,114
989.10	12,628	11,032	994.20	23,640	103,466
989.20	12,833	12,305	994.30	23,886	105,843
989.30	13,040	13,599	994.40	24,132	108,243
989.40	13,248	14,913	994.50	24,380	110,669
989.50	13,458	16,248	994.60	24,629	113,119
989.60	13,670	17,605	994.70	24,879	115,595
989.70	13,883	18,982	994.80	25,130	118,095
989.80	14,098	20,382	994.90	25,383	120,621
989.90	14,315	21,802	995.00	25,637	123,172
990.00	14,533	23,245			
990.10	14,763	24,709			
990.20	14,994	26,197			
990.30	15,227	27,708			
990.40	15,462	29,243			
990.50	15,699	30,801			
990.60	15,937	32,382			
990.70	16,177	33,988			
990.80	16,419	35,618			
990.90	16,663	37,272			
991.00	16,909	38,951			
991.10	17,101	40,651			
991.20	17,293	42,371			
991.30	17,487	44,110			
991.40	17,682	45,868			
991.50	17,878	47,646			
991.60	18,074	49,444			
991.70	18,272	51,261			
991.80	18,472	53,098			
991.90	18,672	54,955			
992.00	18,873	56,833			
992.10	19,077	58,730			
992.20	19,281	60,648			
992.30	19,487	62,586			
992.40	19,694	64,545			
992.50	19,902	66,525			
992.60	20,111	68,526			
992.70	20,322	70,548			
992.80	20,533	72,590			
992.90	20,745	74,654			
993.00	20,959	76,739			

LANDES ENGINEERING LLC & ASSOCIATES

ENVIRONMENTAL, ENGINEERING & DEVELOPMENT CONSULTANTS

TRANSMITTAL FORM

DATE: 8-23-19

TO: City of Shawnee

# of Copies	Description
	Preliminary Plat Application
3	Preliminary Plat (Full size)
1	Preliminary Plat (Ledger size)
	Final Plat Application
	Final Plat (Full size)
	Water Plans
	Sewer Plans
	Road Plans
	Drainage Plans
	Construction Plans
	Engineering Report Form
1	Hydraulic Report
	ODOT / NOI Form
	Site Plan
	Easement
	Easement Vacation

RECEIVED BY: _____ DATE: _____

+

City of Shawnee OK
405-878-1616

REC#: 02276378 3/25/2019 10:35 AM
OPER: KG TERM: 020
REF#: 10031
PAID BY:

TRAN: 401.0000 BUILDING PERMIT
190261 280.00CR
LANDES ENGINEERING
NONE
Z-REZONING 280.00CR

TRAN: 401.0000 BUILDING PERMIT
190262 366.00CR
LANDES ENGINEERING
NONE
X-PLATREV 366.00CR

TENDERED: 646.00 CHECK
APPLIED: 646.00-

CHANGE: 0.00

Visit www.ShawneeOK.org
For More Information

From: [Michael Ludi](#)
To: [Rebecca Blaine](#)
Cc: [Joseph A. Barker](#); [Alan Blankenship](#)
Subject: Cardinal Pointe Preliminary Plat Engineering Review #5
Date: Monday, August 26, 2019 11:37:53 AM

Rebecca,

My comments and concerns have been addressed to a point that they are acceptable to me for the preliminary plat.

I recommend the preliminary plat be placed on the planning commissions next available agenda.

Michael Ludi,

Director of Engineering
Traffic, GIS

From: Michael Ludi
Sent: Wednesday, August 14, 2019 7:58 AM
To: Rebecca Blaine <Rebecca.Blaine@shawneeok.org>
Cc: Joseph A. Barker <Joseph.Barker@shawneeok.org>; Alan Blankenship <Alan.Blankenship@shawneeok.org>
Subject: Cardinal Pointe Preliminary Plat Engineering Review #4

Rebecca,

Below are my review comments for the 4th submittal of the Cardinal Point Preliminary Plat.

- 12. Review #1 comment... Show the locations of all proposed street lights that will be installed.
- 12. Landes response... It can be reviewed and discussed where the city want them. The city pays the bill so I was going to allow them to define during the design stage.
- 12. Review #2... The street lighting will need to be laid out as per sub reg 60.13. The city will review the locations but they first have to be shown so that we have something to review.
- 12. Review #3... No corrections have been made therefore the street lights are still not shown as originally requested.
- 12. Review #4... Add a street light on the west side of Red Bird Rd between lots 3 & 4 of block 1.

I. Review #2... Offsite easements for the sanitary sewer will need to be obtained. For the preliminary plat to be approved we will accept a letter of intent from the adjacent property owners stating that they intend on granting you the easements necessary. The final filed easements will then need to be submitted to us prior to receiving any approval for the construction plans.

I. Review #3... We have not received the previously requested letter of intent. The alignment location and the property owner have changed but due to the necessity of this easement to make this a viable project, it is a requirement that the letter of intent be received prior to this project being placed on an agenda.

I. Review #4... The adjacent property owner to the north has met with engineering department and expressed his willingness to provide an easement across his property therefore a letter of intent will no longer be required although it is still advised as a good measure. The layout of the sanitary needs to be updated to reflect this change.

C3. Review #3... The storm sewer design shown on the preliminary plat does not match the design submitted in the hydro/det report.

C3. Review #4... The data presented on the preliminary plat still does not match the hydro/det report. I understand that this is a preliminary report and that it may change as the design is looked at more closely for a final submittal however, all the pipe sizes, contours and elevations should match between the sheets and the report, even on a preliminary submittal. I did not do an exhaustive review of the hydro/det report as this point but I will list 4 examples of the type of issues I'm speaking about. (1) On the outlet structure of the detention pond the structure in the report is 2 10" pipes, on the hydro/det map it is 2 18" pipes, and on the prelim plat it is shown as a single 24" pipe. (2) The elevations of the outlet structure in the report are 980.00' in and 979.30' out while the prelim plat shows 987.20' in and 987.00' out. That's a difference of over 7' in depth. If the elevations in this report are to be used it means that a 7' deep channel will need to be cut through the adjacent property to the north until it reaches the channel. By my rough grading figures it would set the grade of the channel at around 0.60% which means that it will not drain properly. (3) The contours of the pond don't match from sheet to sheet. (4) The segments of the storm sewer pipe from C2 to D2 are shown as 48" in the report but on the hydro/det map they are shown as 42".

New Comments...

AA1. Due to the significant size that the channel across the property to the north appears to be, show the preliminary contours to ensure constructability within the proposed easement that will be obtained.

BB2. Label all storm sewer pipe sizes on the preliminary plat.

Michael Ludi,

Director of Engineering
Traffic, GIS

From: Michael Ludi

Sent: Thursday, July 25, 2019 4:49 PM

To: Rebecca Blaine <Rebecca.Blaine@shawneeok.org>

Cc: Joseph A. Barker <Joseph.Barker@shawneeok.org>; Alan Blankenship <Alan.Blankenship@shawneeok.org>

Subject: Cardinal Pointe Preliminary Plat Engineering Review #3

Rebecca,

Below are my review comments for the 3rd submittal of the Cardinal Point Preliminary Plat.

11. Review #1 comment... The present right-of-way needs to be clearly shown and labeled along 45th St & Union St.

11. Landes response... That was corrected.

11. Review #2... No visible correction has been made as was indicated.

11. Review #3... No correction has been made along Union.

12. Review #1 comment... Show the locations of all proposed street lights that will be installed.

12. Landes response... It can be reviewed and discussed where the city want them. The city pays the bill so I was going to allow them to define during the design stage.

12. Review #2... The street lighting will need to be laid out as per sub reg 60.13. The city will review the locations but they first have to be shown so that we have something to review.

12. Review #3... No corrections have been made therefore the street lights are still not shown as originally requested.

G. Review #2... Sanitary sewer lines shall not be located directly on the lot lines. They need to be shifted of center so that the manholes don't all end up underneath fences.

G. Review #3... No corrections have been made as previously requested. The specific segments that need corrected are between... MH18 to MH23, MH21 to MH17, MH15 to MH14, MH13 to MH12, MH11 to MH9, MH5 to MH4.

H. Review #2... Label all sanitary sewer line sizes.

H. Review #3... Several locations have not been corrected as previously requested. The specific segments that need corrected are between... MH24 to MH17, MH12 to MH16, MH15 to MH14, MH13 to MH12, MH8 to MH5, MH9 to MH5.

I. Review #2... Offsite easements for the sanitary sewer will need to be obtained. For the preliminary plat to be approved we will accept a letter of intent from the adjacent property owners stating that they intend on granting you the easements necessary. The final filed easements will then need to be submitted to us prior to receiving any approval for the construction plans.

I. Review #3... We have not received the previously requested letter of intent. The alignment location and the property owner have changed but due to the necessity of this easement to make this a viable project, it is a requirement that the letter of intent be received prior to this project being placed on an agenda.

L. Review #2... A 6' sidewalk is required along Union frontage of Roadrunner Dr.

L. Review #3... Add a label listing the width of the sidewalk along Union St. The current submittal measures this to be drawn as a 5' width while 6' is required.

New Comments...

A1. The flood statement on all sheets need to be updated to use current mapping information. It is currently using the old info on both the preliminary plat and the hydro/det report.

B2. The drainage areas shown and labeled on sheet 1 do not match those shown on the hydro/det report.

C3. The storm sewer design shown on the preliminary plat does not match the design submitted in

the hydro/det report.

D4. On the preliminary plat, label the RCB size that is to be constructed under Roadrunner Dr.

E5. On all sheets that show the area previously known as lot 1 block 1 on previous submittals, the proposed 50' right-of-way line is still being shown. Seeing as though this area has been removed from the plat, all items referring to this area should be removed as-well.

F6. The proposed 12" waterline is now showing that it is to be extended from east of the project site. The preliminary plat needs to show the entire proposed utility layout. It currently does not show where to existing line is located that will begin the extension.

G7. The labels calling for the 12" waterline to begin west of the site need to be removed if that is no longer the plan.

H8. The label number for the sanitary sewer manhole located in lot 36 of block 1 needs to be shown on the plans.

I9. The offsite sanitary sewer easement is currently a width of 10' and needs to be a width of 20'.

J10. A 4th review submittal is required.

Michael Ludi,

Director of Engineering
Traffic, GIS

From: Michael Ludi

Sent: Friday, June 14, 2019 11:26 AM

To: Rebecca Blaine <Rebecca.Blaine@shawneeok.org>

Cc: Joseph A. Barker <Joseph.Barker@shawneeok.org>; Alan Blankenship
<Alan.Blankenship@shawneeok.org>

Subject: Cardinal Pointe Preliminary Plat Engineering Review #2

Rebecca,

Below are my review comments for the 2nd submittal of the Cardinal Point Preliminary Plat.

5. Original comment... Roadrunner Dr. is crossing a floodplain. Have you complete the calculations to show that a single 60" pipe will carry the 100 year storm?

5. Landes response... No, that will be completed during the design.

5. New comment... Since we know the creek that Roadrunner Dr. is crossing is flowing nearly 1,000 c.f.s. wouldn't it be more appropriate to show a proposed design that appears to work versus something that does not? At the preliminary plat stage we are not asking for a 100% completed design document but we are asking for a document that has been thought through enough to convey the desired design intent and indicate enough correct information that we can discern that it will work before moving forward.

6. Original comment... There is no storm sewer shown along Roadrunner dr.

6. Landes response... That is correct, when hydraulic calculations are complete & reviewed, they will

be incorporated into the final plans

6. New comment... All proposed storm sewers are required to be shown. Since we know there will need to be storm sewer along Roadrunner Dr. they need to be included in your plan.

8. Original comment... Label the right-of-way along Roadrunner Dr. It has several widths that need to be clarified.

8. Landes response... The area will all be a right of way, additional labels will be provided.

8. New comment... This still needs clarified. No additional labels have been provided as was indicated.

10. Original comment... At the intersection of Roadrunner & Pigeon Run, the north side of the intersection does not appear to be able to be constructed fully.

10. Landes response... That is correct, I can not have it extend to the north but that is what you require.

10. New comment... Roadrunner Dr. will need to be moved south in order for the entire return to be constructed.

11. Original comment... The present right-of-way needs to be clearly shown and labeled along 45th St & Union St.

11. Landes response... That was corrected.

11. New comment... No visible correction has been made as was indicated.

12. Original comment... Show the locations of all proposed street lights that will be installed.

12. Landes response... It can be reviewed and discussed where the city want them. The city pays the bill so I was going to allow them to define during the design stage.

12. New comment... The street lighting will need to be laid out as per sub reg 60.13. The city will review the locations but they first have to be shown so that we have something to review.

13. Original comment... The roadway shown as Red Bird Road will be considered as a collector and therefore will need to be a 32' section. Please add an addition typical section for this width to the sheet.

13. Landes response... This is a local Street

13. New comment... After further consideration I have determined that Red Bird Road should be considered a local street. The additional typical section for the 32' collector is still required due to Roadrunner Dr. being a collector.

18. Original comment... Lot 1 of block 1 is not properly served by sanitary sewer.

18. Landes response... It can be removed, if you'd like, it was requested to include this lot do to city wanting the additional right of way along 45th Street. The sewer can be extended to include.

18. New comment... The lot must have sanitary sewer extended to it to make it a legal lot. Keep in mind that if the sewer serving this lot crosses private property a separate utility easement will need to be granted from the property that you are crossing.

24. Original comment... Lot 24 of block 4 is mislabeled as lot 2.

24. Landes response... No, the 4 was obscured.

24. New comment... The lot is still mislabeled and says lot 2.

25. Original comment... Whippoorwill Cr. can't be constructed as an incomplete cul-de-sac.

25. Landes response... Road was shifted to allow completion of cul-de-sac

25. New comment... Whippoorwill was shifted to the south but was not shifted enough for the road right-of-way to fall solely within this subdivision.

26. Original comment... The 3' trickle channel is shown to be constructed on another property. This needs to be within the boundary of this plat or a separate easement needs to be filed that contains it.

26. Landes response... This is a preliminary plat, before this project is completed or submitted, of-site easements will be obtained.

26. New comment... I have spoken to the adjacent property owner and he has stated to me that this will not be granted. Therefore this trickle channel will need to be removed from the plans.

New comments...

- A. Sheets #2 & #3 are not printed to scale.
- B. Sanitary sewer manhole #8A needs to be moved west in order to properly serve lot 2 of block 5.
- C. Sanitary sewer manhole #12A needs to be moved south in order to properly serve lot 5 of block 2.
- D. Sanitary sewer manhole #13A needs to be moved east in order to properly serve lot 6 of block 2.
- E. Sanitary sewer manhole #6 needs to be moved south in order to properly serve lot 9 of block 3.
- F. Sanitary sewer manhole #20 needs to be moved west in order to properly serve lot 20 of block 2.
- G. Sanitary sewer lines shall not be located directly on the lot lines. They need to be shifted of center so that the manholes don't all end up underneath fences.
- H. Label all sanitary sewer line sizes.
- I. Offsite easements for the sanitary sewer will need to be obtained. For the preliminary plat to be approved we will accept a letter of intent from the adjacent property owners stating that they intend on granting you the easements necessary. The final filed easements will then need to be submitted to us prior to receiving any approval for the construction plans.
- J. A lot of information is not shown in various locations due to text overlaps such as lot numbers, acreage sizes, bearings, distances etc.... these need corrected so that all labels are legible.
- K. Roadrunner Dr. is required to have sidewalks along both sides of the roadway.
- L. A 6' sidewalk is required along Union frontage of Roadrunner Dr.
- M. The location & size of the proposed storm water control system, including the detention ponds, need to be shown. The current plan does not show any detention or location where detention is planned. The plans need to show enough information that it can be discerned that it will work. There have been many comments made by you regarding your plans for a regional detention facility, After speaking with the adjacent property owner he was very clear to me that he has no intention of pursuing your idea and that the engineering firm that he has hired will handle his development completely separate from yours.

N. A 3rd review submittal is required.

Michael Ludi,

Director of Engineering
Traffic, GIS

From: Michael Ludi

Sent: Tuesday, May 07, 2019 7:17 AM

To: Joseph A. Barker <Joseph.Barker@shawneeok.org>

Cc: Rebecca Blaine <Rebecca.Blaine@shawneeok.org>; Alan Blankenship
<Alan.Blankenship@shawneeok.org>; Jared Cooper <JCooper@shawneeok.org>

Subject: Cardinal Pointe Preliminary Plat Engineering Review

Joseph,

Below are my review comments for the Cardinal Point Preliminary Plat,

1. The flood zone map number that is called out will be changed as of May 16, 2019. Please update the callout notes to reference this date and map number 40125C0070J.
2. Storm water detention report & Drainage maps are required. In the current form there is nothing shown to indicate proposed grades or detention location.
3. Storm sewer layout along the streets to the detention pond need to be shown with enough information that it can be discerned that it will work.
4. Storm sewer inlets along the roadways seem to be spaced at a great distance in some areas and picking up a lot of area. Make sure that the storm water spread widths don't get too wide and turn the roadway into a flume.
5. Roadrunner Dr. is crossing a floodplain. Have you complete the calculations to show that a single 60" pipe will carry the 100 year storm?
6. There is no storm sewer shown along Roadrunner dr.
7. A drainage easement will be required along the north side of lot 1 block 3 if the storm sewer remains in this location after detention plans are created.
8. Label the right-of-way along Roadrunner Dr. It has several widths that need to be clarified.
9. Along the north side of Roadrunner Dr. there seems to be a return of some type shown. This needs to be clarified as to what this is (Street or driveway)?
10. At the intersection of Roadrunner & Pigeon Run, the north side of the intersection does not appear to be able to be constructed fully.
11. The present right-of-way needs to be clearly shown and labeled along 45th St & Union St.
12. Show the locations of all proposed street lights that will be installed.
13. The roadway shown as Red Bird Road will be considered as a collector and therefore will need to be a 32' section. Please add an addition typical section for this width to the

sheet.

14. The right-of-way will need to be 60' along Red Bird Road due to it being considered a collector street.
15. Along Red Bird Road 4' sidewalks are required along both sides of the street due to this being a collector street.
16. Label the street classifications IE. Local of Collector.
17. The roadway connection to Union needs to be shown. Currently the street is not show, the street name is not labeled, the proposed road does not show an entrance it just runs the road straight and never ties in.
18. Lot 1 of block 1 is not properly served by sanitary sewer.
19. Lots 2-4 of block 6 are not properly served by sanitary sewer.
20. Sanitary Sewer manhole #17 needs to be moved south in order to properly serve lots 12 & 13 of block 4.
21. Sanitary Sewer manhole #10 needs to be moved north in order to properly serve lots 1 & 24 of block 4.
22. The sanitary sewer main needs to be relocated out from under the roadway along the cul-de-sacs. The sewer should run along the back of the lots.
23. Lots 23-26 of block 3 need to have a sanitary sewer main running along the back of the lots so that the service lines do not have to run underneath the roadway to the east.
24. Lot 24 of block 4 is mislabeled as lot 2.
25. Whippoorwill Cr. can't be constructed as an incomplete cul-de-sac.
26. The 3' trickle channel is shown to be constructed on another property. This needs to be within the boundary of this plat or a separate easement needs to be filed that contains it.
27. The 2" blow offs at the ends of the cul-de-sacs need to be changed to fire hydrants.

Michael Ludi,

Director of Engineering
Traffic, Gis
222 N. Broadway
Shawnee, OK 74802
Phone (405) 878-1760
Fax (405) 878-1719



From: [Alan Blankenship](#)
To: [Joseph A. Barker](#)
Cc: [Rebecca Blaine](#)
Subject: RE: Cardinal Pointe Preliminary Plat - Supplemental Documents
Date: Wednesday, August 14, 2019 6:57:07 AM
Attachments: [image001.png](#)

Morning Joseph,

The Cardinal Point preliminary plat concerns look to have been addressed. The SMA approves this project to move forward to the next phase.

From: Joseph A. Barker
Sent: Tuesday, August 6, 2019 11:48 AM
To: Alan Blankenship <Alan.Blankenship@shawneeok.org>; Andy Starkey <AStarkey@shawneeok.org>; Brittney Burton <brittney.burton@shawneeok.org>; David Anderson <DAnderson@shawneeok.org>; James Kriwanek <Jkriwanek@shawneeok.org>; Rebecca Blaine <Rebecca.Blaine@shawneeok.org>; Shalah Black <shalah.black@shawneeok.org>
Cc: Michael Ludi <MLudi@shawneeok.org>
Subject: Cardinal Pointe Preliminary Plat - Supplemental Documents

Good morning, everyone,

I have attached to this e-mail the following supplemental documents submitted by Landes Engineering for the Cardinal Pointe Preliminary Plat:

- A written response by Landes Engineering to the most recently submitted comments by staff;
- A pipeline-wire line application; and
- A BNSF utility accommodation policy.

Joseph Barker

Assistant City Planner

[222 N. Broadway](#)

[Shawnee, OK 74801](#)

[\(405\) 878 - 1672](#)

Joseph.Barker@shawneeok.org



From: [David Anderson](#)
To: [Joseph A. Barker](#)
Subject: RE: Cardinal Pointe Preliminary Plat - Supplemental Documents
Date: Wednesday, August 14, 2019 4:17:45 PM
Attachments: [image001.png](#)

Joseph,

I'm still good on this one. Thanks.

David

From: Joseph A. Barker <Joseph.Barker@shawneeok.org>
Sent: Tuesday, August 6, 2019 11:48 AM
To: Alan Blankenship <Alan.Blankenship@shawneeok.org>; Andy Starkey <AStarkey@shawneeok.org>; Brittney Burton <brittney.burton@shawneeok.org>; David Anderson <DAnderson@shawneeok.org>; James Kriwanek <Jkriwanek@shawneeok.org>; Rebecca Blaine <Rebecca.Blaine@shawneeok.org>; Shalah Black <shalah.black@shawneeok.org>
Cc: Michael Ludi <MLudi@shawneeok.org>
Subject: Cardinal Pointe Preliminary Plat - Supplemental Documents

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I have attached to this e-mail the following supplemental documents submitted by Landes Engineering for the Cardinal Pointe Preliminary Plat:

- A written response by Landes Engineering to the most recently submitted comments by staff;
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Joseph Barker

Assistant City Planner

[222 N. Broadway](#)

[Shawnee, OK 74801](#)

[\(405\) 878 - 1672](#)

Joseph.Barker@shawneeok.org



Regular Board of Commissioners

7.

Meeting Date: 09/16/2019

Surplus - Scrap

Submitted By: Kacie Eck, City Clerk

Department: City Clerk

Information

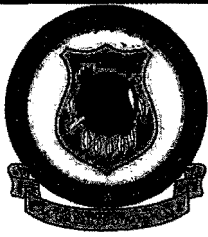
Title of Item for Agenda

Consider a resolution to declare certain Shawnee Police Department vehicles surplus property and authorize the sale of said items for scrap.

Attachments

Memo

Resolution



City of Shawnee

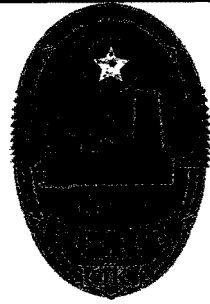
Chief Mason Wilson

16 W 9th

Shawnee, Oklahoma 74801

Office (405) 878-1680 or 1681 *Fax (405) 878-1520

E-Mail: mwilson@shawneeok.org



FROM : Mason Wilson 
Chief of Police

TO : Chance Allison
City Manager

SUBJECT : Request to Surplus Vehicles

DATE : September 4, 2019

I am requesting approval from the commission to surplus old police vehicles.

The following is a list of the vehicles for surplus:

1. (3575) 2011 Ford Crown Vic with 128,904 miles, VIN:2FABP7BV4BX104653, the transmission is bad, the vehicle has been used for parts, it will be scrapped.
2. (3524) 2007 Ford Crown Vic with 150,685 miles, VIN: 2FAFP71W37X155483, the transmission is bad, the vehicle has been used for parts, it will be scrapped.
3. (3358) 2006 Ford Crown Vic with 173,577 miles, VIN: 2FAFP71W26X163881, this vehicle has been used for parts and will be scrapped.
4. (3354) 2006 Ford Crown Vic with 139422 miles, VIN: 2FAFP71W36X123177, this vehicle has been used for parts and will be scrapped.
5. (3230) 2003 Chevy Impala with 120,529 miles, VIN: 2G1WF55K449279568, this vehicle will be placed in the next auction.
6. (2408) 2000 Ford Crown Vic with 167,947 miles, VIN: 2FAFP71W1YX113668, this vehicle will be placed in the next auction.
7. (3485) 1999 Ford E-450 with 233,570 miles, VIN: 1FDXE40F7XHC26359, if OBU Police Dept. still wants this vehicle we would like to donate it. This vehicle will go to the next auction if not donated.

RESOLUTION NO. ____

A RESOLUTION DECLARING CERTAIN CITY OF SHAWNEE POLICE DEPARTMENT VEHICLES SURPLUS PROPERTY AND NO LONGER NEEDED FOR CITY PURPOSES; DESCRIBING SAID ITEMS; AND AUTHORIZING THE SALE OF SAID ITEMS FOR SCRAP.

BE IT RESOLVED BY THE BOARD OF COMMISSIONERS OF THE CITY OF SHAWNEE, OKLAHOMA:

That the items of personal property are described as:

- 1) 2011 Ford Crown Victoria
COS Asset No. 3575
VIN: 2FABP7BV4BX104653
- 2) 2007 Ford Crown Victoria
COS Asset No. 3524
VIN: 2FAFP71W37X155483
- 3) 2006 Ford Crown Victoria
COS Asset No. 3358
VIN: 2FAFP71W26X163881
- 4) 2006 Ford Crown Victoria
COS Asset No. 3354
VIN: 2FAFP71W36X123177

Said property is hereby declared a City owned item which is surplus and no longer needed for City purposes; that the City of Shawnee is authorized to sale the items for scrap.

PASSED AND APPROVED this 16th day of September, 2019.

RICHARD FINLEY, MAYOR

ATTEST:

LISA LASYONE, CMC, CITY CLERK

Regular Board of Commissioners

8.

Meeting Date: 09/16/2019

Surplus - Auction

Submitted By: Kacie Eck, City Clerk

Department: City Clerk

Information

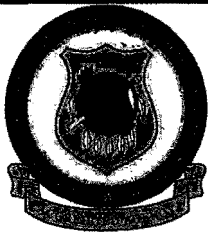
Title of Item for Agenda

Consider a resolution to declare certain Shawnee Police Department vehicles surplus property and authorize the sale of said items at auction or disposal at the City's discretion.

Attachments

Memo

Resolution



City of Shawnee

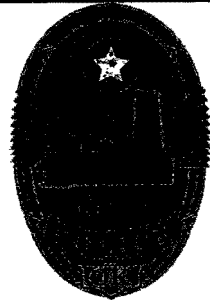
Chief Mason Wilson

16 W 9th

Shawnee, Oklahoma 74801

Office (405) 878-1680 or 1681 *Fax (405) 878-1520

E-Mail: mwilson@shawneeok.org



FROM : Mason Wilson
Chief of Police 

TO : Chance Allison
City Manager

SUBJECT : Request to Surplus Vehicles

DATE : September 4, 2019

I am requesting approval from the commission to surplus old police vehicles.

The following is a list of the vehicles for surplus:

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2. (3524) 2007 Ford Crown Vic with 150,685 miles, VIN: 2FAFP71W37X155483, the transmission is bad, the vehicle has been used for parts, it will be scrapped.
3. (3358) 2006 Ford Crown Vic with 173,577 miles, VIN: 2FAFP71W26X163881, this vehicle has been used for parts and will be scrapped.
4. (3354) 2006 Ford Crown Vic with 139422 miles, VIN: 2FAFP71W36X123177, this vehicle has been used for parts and will be scrapped.
5. (3230) 2003 Chevy Impala with 120,529 miles, VIN: 2G1WF55K449279568, this vehicle will be placed in the next auction.
6. (2408) 2000 Ford Crown Vic with 167,947 miles, VIN: 2FAFP71W1YX113668, this vehicle will be placed in the next auction.
7. (3485) 1999 Ford E-450 with 233,570 miles, VIN: 1FDXE40F7XHC26359, if OBU Police Dept. still wants this vehicle we would like to donate it. This vehicle will go to the next auction if not donated.

RESOLUTION NO. ____

A RESOLUTION DECLARING CERTAIN CITY OF SHAWNEE POLICE DEPARTMENT VEHICLES SURPLUS PROPERTY AND NO LONGER NEEDED FOR CITY PURPOSES; DESCRIBING SAID ITEMS; AND AUTHORIZING THE SALE OF SAID ITEMS BY AUCTION AND, IN THE EVENT ITEMS DO NOT SELL AT AUCTION, DISPOSAL AT THE CITY'S DISCRETION.

BE IT RESOLVED BY THE BOARD OF COMMISSIONERS OF THE CITY OF SHAWNEE, OKLAHOMA:

That the items of personal property are described as:

- 1) 2003 Chevrolet Impala
COS Asset No. 3230
VIN: 2G1WF55K449279568
- 2) 2000 Ford Crown Victoria
COS Asset No. 2408
VIN: 2FAFP71W1YX113668

Said property is hereby declared a City owned item which is surplus and no longer needed for City purposes; that the City of Shawnee is authorized to sale the items by auction. If any items do not sell at auction, said items may be disposed of at the City of Shawnee's discretion.

PASSED AND APPROVED this 16th day of September, 2019.

RICHARD FINLEY, MAYOR

ATTEST:

LISA LASYONE, CMC, CITY CLERK

Regular Board of Commissioners

9.

Meeting Date: 09/16/2019

Surplus - Donation

Submitted By: Kacie Eck, City Clerk

Department: City Clerk

Information

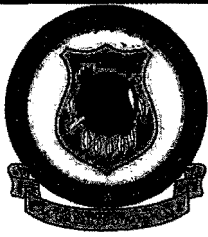
Title of Item for Agenda

Consider a resolution to declare a certain Shawnee Police Department vehicle surplus property and donate to the Oklahoma Baptist University Police Department or disposal at the City's discretion.

Attachments

Memo

Resolution



City of Shawnee



Chief Mason Wilson

16 W 9th

Shawnee, Oklahoma 74801

Office (405) 878-1680 or 1681 *Fax (405) 878-1520

E-Mail: mwilson@shawneeok.org

FROM : Mason Wilson
Chief of Police 

TO : Chance Allison
City Manager

SUBJECT : Request to Surplus Vehicles

DATE : September 4, 2019

I am requesting approval from the commission to surplus old police vehicles.

The following is a list of the vehicles for surplus:

1. (3575) 2011 Ford Crown Vic with 128,904 miles, VIN:2FABP7BV4BX104653, the transmission is bad, the vehicle has been used for parts, it will be scrapped.
2. (3524) 2007 Ford Crown Vic with 150,685 miles, VIN: 2FAFP71W37X155483, the transmission is bad, the vehicle has been used for parts, it will be scrapped.
3. (3358) 2006 Ford Crown Vic with 173,577 miles, VIN: 2FAFP71W26X163881, this vehicle has been used for parts and will be scrapped.
4. (3354) 2006 Ford Crown Vic with 139422 miles, VIN: 2FAFP71W36X123177, this vehicle has been used for parts and will be scrapped.
5. (3230) 2003 Chevy Impala with 120,529 miles, VIN: 2G1WF55K449279568, this vehicle will be placed in the next auction.
6. (2408) 2000 Ford Crown Vic with 167,947 miles, VIN: 2FAFP71W1YX113668, this vehicle will be placed in the next auction.
7. (3485) 1999 Ford E-450 with 233,570 miles, VIN: 1FDXE40F7XHC26359, if OBU Police Dept. still wants this vehicle we would like to donate it. This vehicle will go to the next auction if not donated.

RESOLUTION NO. ____

A RESOLUTION DECLARING A CERTAIN CITY OF SHAWNEE POLICE DEPARTMENT VEHICLE SURPLUS PROPERTY AND NO LONGER NEEDED FOR CITY PURPOSES; DESCRIBING SAID ITEM; AND AUTHORIZING THE DONATION OF SAID ITEM TO THE OKLAHOMA BAPTIST UNIVERSITY POLICE DEPARTMENT AND, IN THE EVENT THE ITEM IS NOT ACCEPTED, DISPOSAL AT THE CITY'S DISCRETION.

BE IT RESOLVED BY THE BOARD OF COMMISSIONERS OF THE CITY OF SHAWNEE, OKLAHOMA:

That the items of personal property are described as:

1999 Ford E-450
COS Asset No. 3485
VIN: 1FDXE40F7XHC26359

Said property is hereby declared a City owned item which is surplus and no longer needed for City purposes; that the City of Shawnee is authorized to donate said item to the Oklahoma Baptist University Police Department. If the item is not accepted, said item may be disposed of at the City of Shawnee's discretion.

PASSED AND APPROVED this 16th day of September, 2019.

RICHARD FINLEY, MAYOR

ATTEST:

LISA LASYONE, CMC, CITY CLERK

Regular Board of Commissioners

10.

Meeting Date: 09/16/2019

Emergency Operations Plan

Submitted By: Kacie Eck, City Clerk

Department: City Clerk

Information

Title of Item for Agenda

Consider a resolution adopting the revised Emergency Operations Plan for the City of Shawnee.

Attachments

Memo



MEMORANDUM FOR: Honorable Mayor and City Commissioners
THROUGH: Chance Allison, City Manager
FROM: Donald D. Lynch, Emergency Management Director
DATE: September 11, 2019
SUBJECT: Request for Approval of EOP Adoption Resolution
MESSAGE:

D. L.

NATURE OF THE REQUEST:

I am requesting approval of the attached resolution adopting the 2019 version of the Emergency Operations Plan for the City of Shawnee

STAFF ANALYSIS /CONSIDERATIONS:

This plan establishes a comprehensive framework of policy and guidance for county and local disaster preparedness, response, recovery, and mitigation operations. The plan details capabilities, authorities, and responsibilities. It establishes mutual understanding among Federal, State, county, municipal, and other public and private non-profit organizations. It also describes a system for effective use of Federal, State, and local government resources as well as private sector resources necessary to preserve the health, safety, and welfare of those persons affected during various emergencies.

The plan begins with an operational approach consistent with the State Emergency Operations Plan and the commonly accepted Incident Command System (ICS), which follows the National Incident Management System (NIMS). ICS is a standardize system used to organize emergency response, and it is the basis for the National Incident Management System (NIMS). Under this system, the types of assistance are grouped by functions and then organized by agency to ensure that coordination and communication is maintained throughout a crisis whenever possible. These support functions are assigned lead and support agencies whose job is to establish, maintain, and carry out plans developed for accomplishing assigned tasks.

The Oklahoma Emergency Management Act of 2003 establishes the authority and responsibilities of the Governor, State agencies, and local government for emergency management in Oklahoma including the preparation and adoption of emergency operations plans, Part of the Superfund Amendments and Reauthorization Act of 1986 (SARA) is the Emergency Planning and Community Right-to-Know Act of 1986 (EPCRA), sometimes referred to as SARA Title III. EPCRA establishes requirements for Federal, state, and local governments, and industry regarding emergency planning and community right-to-know reporting on hazardous chemicals. These form the legal authority for this EOP.

Prior to an emergency, the Emergency Management Director is responsible for coordinating many of the activities that ensure the city and county are prepared to respond to and recover from the many hazards it faces. Responsibilities include maintenance of plans; coordinating infrastructure improvement; applying for State and Federal grants; conducting exercises and training; coordinating with private interests, such as chemical facilities, to ensure proper community planning; and many other activities that contribute to improve all-hazards preparedness and homeland security. During an emergency, the Emergency Management Director is responsible for coordinating public safety matters through the Emergency Operations Center (EOC).

This plan is organized as follows:

- The Basic Plan – The basic plan is a public policy document that provides an overview of the community's approach to emergency operations. The basic plan is intended as an orientation document for the public and senior public officials and is the foundation for supporting operational plans and annexes.
- The Emergency Support Function (ESF) Annexes – outline the scope of responsibilities associated with specific emergency operations functions and describe expected mission execution activities for each emergency phase.
- Hazard Specific Annexes – describe unique considerations for response and recovery from likely regional hazards.
- Function Specific Annexes – describe actions to coordinate and execute common emergency management strategies (e.g., financial management).
- Attachments – provide supplemental information to enhance the effectiveness of the EOP.

The draft text was prepared by the Emergency Management Department and submitted to the stakeholders for each section for review. Comments were then incorporated into a final draft version and submitted to the stakeholders for concurrence. Signatures of concurrence have been obtained from every City department head and the plan has been endorsed by City Manager Chance Allison.

The Emergency Management Department is responsible for updating and maintaining the EOP, in coordination with those departments, agencies, organizations, and other jurisdictions within the county that have been assigned emergency duties or responsibilities. The EOP will be reviewed and tested annually for the purpose of correcting deficiencies identified through actual emergency response operations, drills and exercises, changes in local government and stakeholder structure, technological changes, etc.

A copy of the resolution is attached for your review.

RECOMMENDATION:

Staff recommends approval of the resolution.

BUDGET CONSIDERATION:

Adoption of the EOP is an item for grant compliance and will therefore help us maintain funding for the current fiscal year and comply with the requirement for future grant years.

Thank you for your favorable attention to this request.

**CITY OF SHAWNEE
RESOLUTION**

WHEREAS, the City of Shawnee has the statutory responsibility to develop, implement, and maintain an effective Emergency Operation Plan under the Oklahoma Emergency Management Act of 2003, and

WHEREAS, an adopted Emergency Operations Plan is required as a condition of funding for emergency management activities, and

WHEREAS, the City of Shawnee has developed an Emergency Management Department to oversee and complete these functions for the city, and

WHEREAS, agencies and departments having responsibilities contained within this plan have acknowledged and agreed upon their roles and responsibilities, now

THEREFORE, BE IT RESOLVED, that this Emergency Operation Plan is hereby adopted as the emergency operations plan for the City of Shawnee, This Plan supersedes all previous plans developed for this purpose.

Passed and Approved by the Shawnee City Commission this 16th day of September, 2019.

Richard Finley, Mayor

Attest:

Lisa Lasyone, CMC City Clerk

Approved as to Form and Legality:

Joe Vorndran, City Attorney

Regular Board of Commissioners

11.

Meeting Date: 09/16/2019

Sales Tax/Budget Rpt

Submitted By: Kacie Eck, City Clerk

Department: City Clerk

Information

Title of Item for Agenda

Acknowledge monthly Sales Tax and Budget Report.

Attachments

No file(s) attached.
