ITEM K

CITY OF LA VISTA
MAYOR AND CITY COUNCIL REPORT
AUGUST 20, 2019 AGENDA

Subject:	Type:	Submitted By:
LA VISTA CITY CENTRE PRELIMINARY PLAT	◆ RESOLUTION ORDINANCE RECEIVE/FILE	CHRIS SOLBERG SENIOR PLANNER

SYNOPSIS

A resolution has been prepared for Council to consider a Preliminary Plat for three lots for proposed event venue, anchor office building, and public facilities, and the dedication of associated right-of-way in La Vista City Centre. Approval would be subject to satisfaction of all applicable requirements, including notices, hearings, and approvals of redevelopment plan, redevelopment contract, and subdivision agreement amendments and applicable property conveyances.

FISCAL IMPACT

None.

RECOMMENDATION

Approval, subject to satisfaction of all applicable requirements, including without limitation, notices, hearings, and approvals of redevelopment plan, redevelopment contract, and subdivision agreement amendments and applicable property conveyances. For accuracy and ease of tracking, Staff recommends retitling the plat as Replat 4.

BACKGROUND

A Preliminary Plat application has been submitted by La Vista City Centre, LLC for approximately 4.635 acres currently described as Lots 11-13 and Outlot A, La Vista City Centre, and portions of Tax Lot 12 14-14-12. The purpose of the request is to replat the property into three lots for proposed event venue, anchor office building, and public facilities, with associated right-of-way. A detailed staff report is attached.

The Planning Commission held a meeting on July 18, 2019 and unanimously voted to recommended approval of the Preliminary Plat subject to satisfaction of all applicable requirements, including without limitation, notice, hearing, and approval of an amendment to the Redevelopment Plan and approval and recording of final replat, redevelopment agreement amendment, subdivision agreement amendment, and applicable property conveyances. For accuracy and ease of tracking, Staff recommends retitling the plat as Replat 4. (Note that a separate Replat 3 is scheduled for Council approval before this Replat 4.)

RESOLUTION NO.

A RESOLUTION OF THE MAYOR AND CITY COUNCIL OF THE CITY OF LA VISTA, NEBRASKA, FOR APPROVAL OF THE PRELIMINARY PLAT FOR LOTS 11-13 AND OUTLOT A LA VISTA CITY CENTRE, AND PORTIONS OF TAX LOT 12 14-14-12, TO BE REPLATTED INTO THREE LOTS FOR EVENT VENUE, OFFICE BUILDING, AND PUBLIC FACILITIES.

WHEREAS, the applicant, La Vista City Centre, LLC on behalf of the owners of the above described pieces of property, and the City, have made application for approval of a preliminary plat as presented at this meeting for Lots 11-13 and Outlot A La Vista City Centre, and portions of Tax Lot 12 14-14-12 ("Preliminary Plat"), and

WHEREAS, the City Engineer has reviewed the Preliminary Plat; and

WHEREAS, on July 18, 2019, the La Vista Planning Commission reviewed the Preliminary Plat and recommended approval, subject to satisfaction of applicable requirements.

NOW THEREFORE, BE IT RESOLVED by the Mayor and City Council of the City of La Vista, Nebraska, that, subject to satisfaction of all applicable requirements, including without limitation, notices, hearings, and approvals of redevelopment plan, redevelopment contract, and subdivision agreement amendments and applicable property conveyances, the Preliminary Plat be, and hereby is, approved; provided, however, for accuracy and tracking purposes said Preliminary Plat shall be retitled "Replat 4," and such title shall be incorporated into the plat that is presented for final approval.

BE IT FURTHER RESOLVED that recitals above are incorporated into this Resolution by reference.

PASSED AND APPROVED THIS 20TH DAY OF AUGUST, 2019.

CITY OF LA VISTA

ATTEST: Douglas Kindig, Mayor

Pamela A. Buethe, CMC
City Clerk

CITY OF LA VISTA
PLANNING DIVISION

RECOMMENDATION REPORT

CASE NUMBER: PSPP 19-0001 FOR HEARING OF: August 20, 2019
Report Prepared on: August 8, 2019

I. GENERAL INFORMATION

A. APPLICANT:

La Vista City Centre LLC
P.O. Box 428
Boys Town, NE 68010

B. PROPERTY OWNERS:

Lots 1, 11, & 12 La Vista City Centre Replat Three and Lot 13 La Vista City Centre:
La Vista City Centre LLC
222 S. 15th Street, Suite 1404S
Omaha, NE 68102

Outlot A La Vista City Centre and PT of Tax Lot 12, 14-14-12:
City of La Vista
8116 Park View Blvd.
La Vista, NE 68128

C. LOCATION: North of the intersection of Main Street and City Centre Drive.

D. LEGAL DESCRIPTION: Lots 11-13 and Outlot A La Vista City Centre, and portions of Tax Lot 12 14-14-12

E. REQUESTED ACTION(S): Preliminary Plat for three lots for proposed event venue, anchor office building, and public facilities, and the dedication of associated right-of-way for the purpose of redevelopment.

F. EXISTING ZONING AND LAND USE:
MU-CC, Mixed Use City Centre District, R-1, Single-Family Residential, and FF/FW Flood Plain District (Overlay District); vacant. (proposed to be rezoned to entirely MU-CC, Mixed Use City Centre District).

G. PURPOSE OF REQUEST:

1. Preliminary plat to replat the lots listed in the request into 3 lots and the dedication of associated right-of-way for the purpose of redevelopment.

H. SIZE OF SITE: 4.635 Acres

II. BACKGROUND INFORMATION

A. EXISTING CONDITION OF SITE: The land is generally flat with a gradual downward slope generally north and east, with a significantly increasing downward slope to the north.

B. GENERAL NEIGHBORHOOD/AREA ZONING AND LAND USES:

1. **North:** La Vista Civic Centre Park, R-1 Single-Family Residential with a Gateway Corridor Overlay (Overlay District) and a FF/FW Flood Plain District (Overlay District); Open Recreation Space
2. **East:** La Vista City Centre; MU-CC, Mixed Use City Centre District; Mixed Use development.
3. **South:** La Vista City Centre; MU-CC, Mixed Use City Centre District; Mixed Use development.
4. **West:** Brentwood Plaza; C-1 Shopping Center Commercial with a Gateway Corridor District (Overlay District); Strip center commercial development.

C. RELEVANT CASE HISTORY:

1. The final plat for La Vista City Centre was originally approved by City Council on July 19, 2016.

D. APPLICABLE REGULATIONS:

1. Section 5.06 of the Zoning Regulations – R-1 Single-Family Residential
2. Section 5.18 of the Zoning Regulations – FF/FW Flood Plain District (Overlay District)
3. Section 5.19 of the Zoning Regulations – MU-CC Mixed Use City Centre District
4. Section 3.03 of the Subdivision Regulations – Preliminary Plats

III. ANALYSIS

A. COMPREHENSIVE PLAN: The Future Land Use Map of the Comprehensive Plan designates areas within the existing La Vista City Centre plat area as Mixed Use. The areas north of the existing La Vista City Centre plat area are currently designated as Parks and Recreation and will need to be redesignated for Mixed Use prior to redevelopment.

B. OTHER PLANS: This area was identified in *A Vision Plan for 84th Street* as a possible location for an amphitheater that adjoins into Civic Center park, "a regional destination for the entire community." This area has also been designated as blighted and substandard and in need of redevelopment. An amendment to the *84th Street Redevelopment Plan* to add the northern portion of the La Vista City Centre Theater plat to the specific redevelopment area is anticipated.

C. **TRAFFIC AND ACCESS:**

1. The Preliminary Plat includes the dedication of additional right-of-way along City Centre Drive.

2. The access point at 84th Street and Summer Drive has been converted to a temporary construction entrance. Existing access to City Centre Drive is from Main Street, with connections to 84th Street and Giles Road through the internal road system. The development plan also proposes the connection of City Center Drive to 84th Street in the near future.

   Sidewalk and trail connections will be made at the time of development for each of the parcels involved in the plat.

3. A technical memorandum regarding traffic has been provided to update the previous traffic impact study performed by Olsson in August 2016 for the La Vista City Centre project. This memorandum was compiled to assess the traffic impacts associated with the proposed land use change on the north end of the La Vista City Centre project.

   Staff review of the technical memorandum concluded that the infrastructure that exists and that has been designed and nearing completion in La Vista City Centre is sufficient for the smaller entertainment events. That is based on the prediction in the memo that up to 400 persons in 200 vehicles would be arriving during the PM peak hour, which will overlap with the typical PM peak demand of the corridor.

   For the large outdoor events (estimated at 10 per year) and the larger indoor events (estimated at 15 per year), an event traffic management plan needs to be prepared and needs to be part of the Conditional Use Permit for the proposed event center. If the anticipated traffic for events overlapping with peak hour traffic on 84th Street is greater than the predicted in the technical memorandum, then the conditional use permit will need a provision allowing for starting times to be delayed as to offset traffic demand from the peak hour in the corridor.

D. **UTILITIES:**

1. The properties have access to water, sanitary sewer, gas, power and communication utilities.

IV. **REVIEW COMMENTS:**

1. Applicant intends to develop the proposed Lot 1 with an Event Center use. Development of such use will require the rezoning of portions of the property north of the existing La Vista City Centre

plat boundary within this Preliminary Plat to the MU-CC, Mixed Use-City Center zoning district. Areas already zoned FF/FW Flood Plain District (Overlay District) would remain zoned with that overlay.

To complete the rezoning, a Comprehensive Plan amendment will be necessary to re-designate the areas of this Preliminary Plat that are north of the original La Vista City Center plat area from Parks and Recreation to Mixed Use prior to City Council review of the rezoning request.

As the proposed event center use is only allowed within the Mixed-Use City Centre zoning district as a conditional use, the applicant will need to obtain a conditional use permit to allow the use.

2. The land swap areas identified on the Preliminary Plat will require the exchange of deeds as part of the subdivision or redevelopment agreements and that process would need to be completed prior to the final plat being recorded.

3. An existing sanitary and an existing storm sewer easement will be released as part of this plat. New easements are shown and will be dedicated as separate instruments in conjunction with the plat.

4. A portion of Lot 2, as proposed, will fall within the FF/FW Flood Plain District (Overlay District). A Floodplain Development Permit will most likely need to be obtained as to ensure flood hazards are analyzed as to satisfy the conditions of the zoning ordinance.

5. An amendment to the Subdivision Agreement will be needed to address public infrastructure installation and expenditures prior to City Council consideration of the replat. There will also be a need for some form of development agreement to address shared, common-area improvements between the lots. Such an agreement could affect the configuration of the boundary between proposed Lots 1 and 2.

6. The overall disturbed area will exceed five acres. Notations indicate that sediment traps/basins, silt fences, and inlet filters will be utilized for sediment control at a minimum. Dependent on which entity undertakes the site preparation grading for these lots will identify which erosion control permit needs to be modified in Permix to include this area.

V. STAFF RECOMMENDATION – Preliminary Plat:

Staff recommends approval of the Preliminary Plat, subject to satisfaction of all applicable requirements, including without limitation, notices, hearings, and approvals of redevelopment plan, redevelopment contract, and subdivision agreement amendments and applicable property conveyances. For accuracy and ease of tracking, Staff recommends retitling the plat as Replat 4.

VI. PLANNING COMMISSION RECOMMENDATION:

The Planning Commission held a public hearing on July 18, 2019 and unanimously voted to recommend approval of the proposed Preliminary Plat, subject to satisfaction of all applicable requirements, including without limitation, notice, hearing, and approval of an amendment to the Redevelopment Plan and approval and recording of final replat, redevelopment agreement amendment, subdivision agreement amendment, and applicable property conveyances.

VII. ATTACHMENTS TO REPORT:

1. Vicinity Map
2. Staff Review Letter and Applicant Response Letter
3. Preliminary Plat Map set

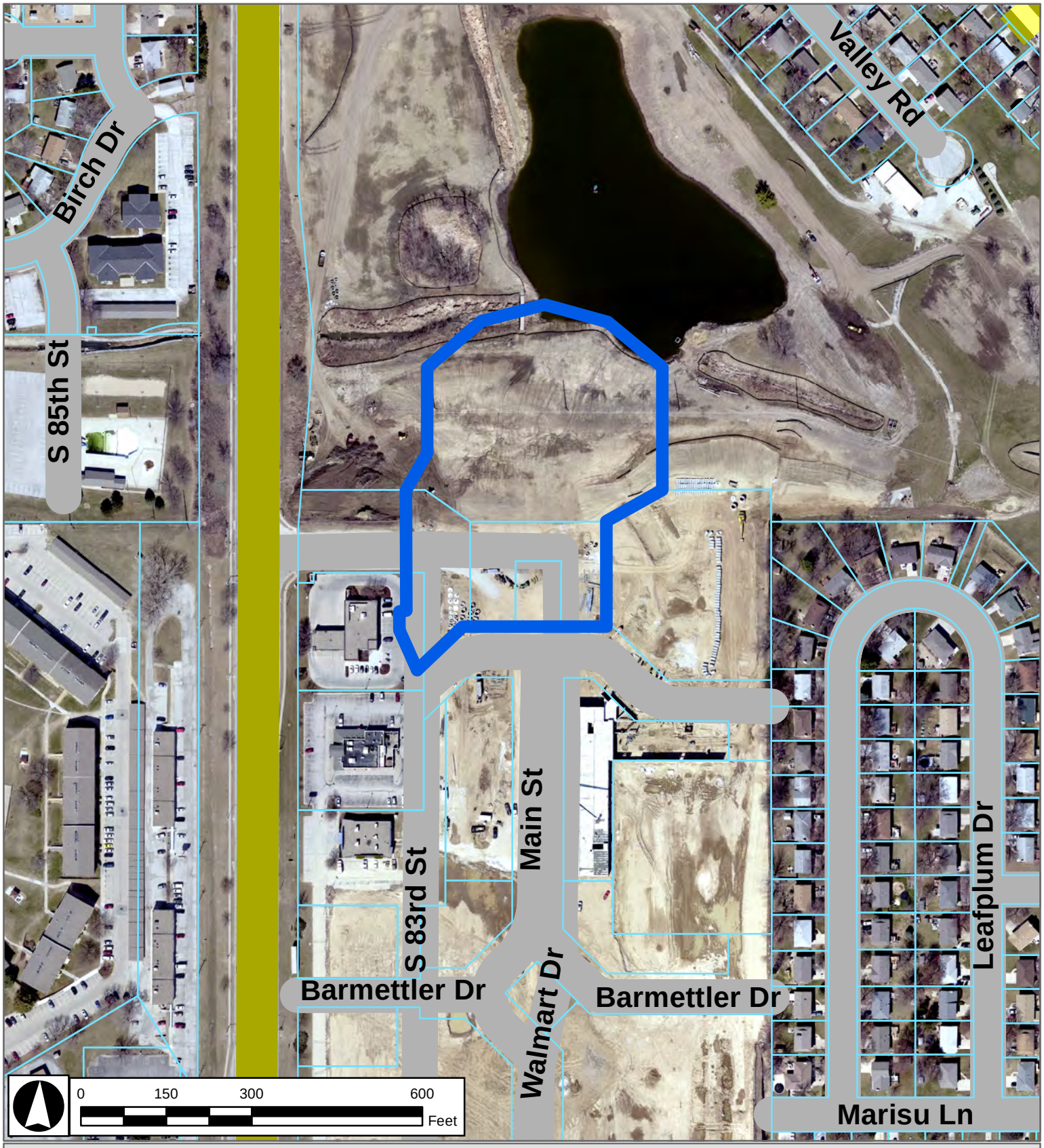
VIII. COPIES OF REPORT SENT TO:

1. Eric Williams, Olsson Associates Inc.
2. Chris Erickson, La Vista City Centre, LLC
3. Public Upon Request

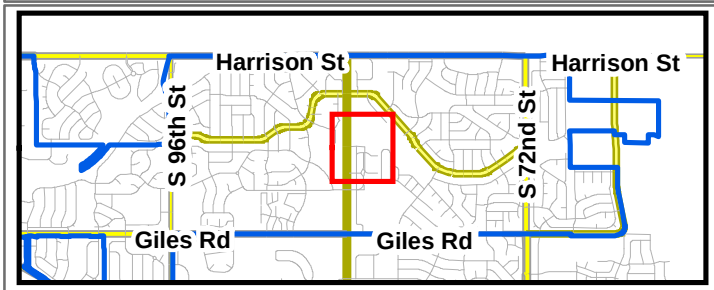
8/16/19

Prepared by:

Community Development Director Date



Project Vicinity Map



La Vista City Centre Theater
Preliminary Plat

6/10/2019

CAS

La Vista

La Vista
Community Pride. Progressive Vision.

May 22, 2019

Chris Erickson
La Vista City Centre, LLC
PO Box 428
Boys Town NE, 68010

RE: Preliminary Plat – Initial Review
La Vista City Centre Theater

Mr. Erickson,

We have reviewed the documents submitted for the above-referenced application. Based on the elements for consideration set forth in the applicable section of the Subdivision Regulations for the Replat the City has the following comments:

Preliminary Plat Review

1. Article 3.03.02: Due to the nature of this preliminary plat please include proposed floor elevations on Lot 14 and on Lot 1. This should include the main floor elevation on Lot 14 and the bottom floor, stage and upper floor elevations on Lot 1.
2. Article 3.03.06: Please provide a legal description of the area being platted, including acreage of the proposed development.
3. Article 3.03.07: The location of the existing edge of normal water surface in the Civic Center Park lake needs to be shown as this affects the boundary of proposed Lot 2. The location of the relocated sanitary outfall sewer north of Lots 1 and 2 should be shown. Both of these can be based on the TD2 topographic survey of the "interface" area dated January 31, 2019. If Olsson does not already have a copy of this survey, the City will make arrangements for Olsson to receive it.
4. Article 3.03.09: The proposed lot areas should be identified in square footage and not acres since appraisals and negotiations will need the areas in square feet.
5. Article 3.03.10: An easement for the public sanitary sewer through Lots 1 and 2 to the outfall sewer needs to be shown. Any storm sewer easements (public or private) proposed over Lots 1 through 3 need to be shown. There should be notations in regards to any proposed blanket easements for ingress and egress amongst the lots and for public benefit.

City Hall
8116 Park View Blvd.
La Vista, NE 68128-2198
p: 402-331-4343
f: 402-331-4375

Community Development
8116 Park View Blvd.
p: 402-331-4343
f: 402-331-4375

Fire
8110 Park View Blvd.
p: 402-331-4748
f: 402-331-0410

Golf Course
8305 Park View Blvd.
p: 402-339-9147

Library
9110 Giles Rd.
p: 402-537-3900
f: 402-537-3902

Police
7701 South 96th St.
p: 402-331-1582
f: 402-331-7210

Public Buildings & Grounds
8112 Park View Blvd.
p: 402-331-4343
f: 402-331-4375

Public Works
9900 Portal Rd.
p: 402-331-8927
f: 402-331-1051

Recreation
8116 Park View Blvd.
p: 402-331-3455
f: 402-331-0299

www.cityoflavista.org
info@cityoflavista.org

6. Article 3.03.12: It appears that an existing sanitary sewer easement and an existing storm sewer easement will need to be released. Please add notations indicating the intent in regards to these easements.

7. Article 3.03.13: Please provide any established floodplain overlay lines. Per Zoning Ordinance Section 5.18, the development's proximity to the delineated Zone A Floodplain will most likely require a Floodplain Development Permit be obtained as to ensure flood hazards are analyzed as to satisfy the conditions of the aforementioned zoning ordinance.

8. Article 3.03.15: An amendment to Subdivision Agreement will be needed to address public infrastructure installation and expenditures prior to City Council consideration of the replat. There will also be a need for some form of development agreement to address shared, common-area improvements between the lots. Such an agreement could affect the configuration of the boundary between Lots 1 and 2.

9. Article 3.03.16: On Sheet C3.1 some notations or illustrations are needed to address this requirement. The overall disturbed area will exceed five acres and add notations that sediment traps/basins, silt fences, and inlet filters will be utilized for sediment control at a minimum. Dependent on which entity undertakes the site preparation grading for these lots will identify which erosion control permit needs to be modified in Permix to include this area.

10. Article 3 .03.19: To verify that the previous traffic impact study is still adequate, please provide an update on the proposed theater capacity and peak hour parking needs. This would need to identify the time of day for the peak hour events.

11. Article 3.03.20:
    a. Per Item 2 above, show the sanitary outfall sewer.
    b. The storm drainage plan (Sheet C3.1) needs to include conceptual information for proposed water quality treatment. The 2-year peak runoff increase can be addressed in the storm water detention facility in Civic Center Park.
    c. Information concerning a PCSMP plan needs to be provided on Sheet C3 .1. This would include reference to the current plan for PCSMP No. 20170324-3736P and pa11icularly Note 2 on Exhibit "B". Notations as to how runoff from the proposed truck dock and bus parking aprons will be treated are needed at a minimum. These locations have the most potential for pollutants that could affect the lake.

12. A full metes and bounds description of each piece of property proposed to change hands through this process will need to be provided to allow for the commencement of an appraisal process.

In addition to the comments provided above, additional redline comments have been provided in the attached document.

Please submit 4 full size copies (along with electronic copies) of the revised documents for final review.

If you have any questions regarding these comments please feel free to contact me at any time.

Thank you,

Christopher Solberg, AICP
Senior Planner

Attachement

cc: John Kottmann, City Engineer
Pat Dowse, City Engineer
Eric Williams, Olsson Associates

Comment Response: Preliminary Plat-Final Plat Theater

Preliminary Plat Review

1. Article 3.03.02: Due to the nature of this preliminary plat please include proposed floor elevations on Lot 14 and on Lot 1. This should include the main floor elevation on Lot 14 and the bottom floor, stage and upper floor elevations on Lot 1. **Response: Elevations have been provided.**
2. Article 3.03.06: Please provide a legal description of the area being platted, including acreage of the proposed development. **Response: Legal description has been provided.**
3. Article 3.03.07: The location of the existing edge of normal water surface in the Civic Center Park lake needs to be shown as this affects the boundary of proposed Lot 2. The location of the relocated sanitary outfall sewer north of Lots 1 and 2 should be shown. Both of these can be based on the TD2 topographic survey of the "interface" area dated January 31, 2019. If Olsson does not already have a copy of this survey, the City will make arrangements for Olsson to receive it. **Response: This was coordinated with TD2 and the boundary has been revised to accommodate the edge of waterway. Relocated sanitary sewer has also been provided.**
4. Article 3.03.09: The proposed lot areas Should be identified in square footage and not acres since appraisals and negotiations will need the areas in square feet. **Response: This has been updated**
5. Article 3.03.10: An easement for the public sanitary sewer through Lots 1 and 2 to the outfall sewer needs to be shown. Any storm sewer easements (public or private) proposed over Lots 1 through 3 need to be shown. There should be notations in regards to any proposed blanket easements for ingress and egress amongst the lots and for public benefit. **Response: This easement has been added for the existing line through the lot.**
6. Article 3.03.12: It appears that an existing sanitary sewer easement and an existing storm sewer easement will need to be released. Please add notations indicating the intent in regards to these easements. **Response: This will be shown as released on the preliminary plat.**
7. Article 3.03.13: Please provide any established floodplain overlay lines. Per Zoning Ordinance Section 5.18, the development's proximity to the delineated Zone A Floodplain will most likely require a Floodplain Development Permit be obtained as to ensure flood hazards are analyzed as to satisfy the conditions of the aforementioned zoning ordinance. **Response: Floodplain line has been shown. If permitting is needed, this will be provided with the construction plans.**
8. Article 3.03.15: An amendment to Subdivision Agreement will be needed to address public infrastructure installation and expenditures prior to City Council consideration of the replat. There will also be a need for some form of development agreement to address shared, common-area improvement5 between the lots. Such an agreement could affect the configuration of the boundary between Lots 1 and 2. **Response: This will be provide.**

9. Article 3.03.16: On Sheet C3.1 some notations or illustrations are needed to address this requirement. The overall disturbed area will exceed five acres and add notations that sediment traps/basins, silt fences, and inlet filters will be utilized for sediment control at a minimum. Dependent on which entity undertakes the site preparation grading for these lots will identify which erosion control permit needs to be modified in Permix to include this area. **Response: Note has been added.**

10. Article 3.03.19: To verify that the previous traffic impact study is still adequate, please provide an update on the proposed theater capacity and peak hour parking needs. This would need to identify the time of day for the peak hour events. **Response:**

11. Article 3.03.20:
    a. Per Item 2 above, show the sanitary outfall sewer. **Response: Provided.**
    b. The storm drainage plan (Sheet C3.1) needs to include conceptual information for proposed water quality treatment. The 2-year peak runoff increase can be addressed in the storm water detention facility in Civic Center Park. **Response: Storm quality structure has been provided.**
    c. Information concerning a PCSMP plan needs to be provided on Sheet C3.1. This would include reference to the current plan for PCSMP No. 20170324- 3736P and pa11icularly Note 2 on Exhibit "B". Notations as to how runoff from the proposed truck dock and bus parking aprons will be treated are needed at a minimum. These locations have the most potential for pollutants that could affect the lake. **Response: PCSMP information has been added to sheet C3.1 and PCSMP # has been added. A trench drain has been added along the front of the truck dock and will tie in before the vortex system.**

12. A full metes and bounds description of each piece of property proposed to change hands through this process will need to be provided to allow for the commencement of an appraisal process. **Response: This has been provided with the submittal for the requested areas at the theater.**

TECHNICAL MEMORANDUM

Date:	July 10, 2019
To:	John Kottmann, PE Pat Dowse, PE Christopher Solberg, AICP
From:	Dan Bellizzi, PE, PTOE Michael Piernicky, PE, PTOE
RE:	City Centre Lot 13 Music Venue Memorandum
Project #:	016-0546
Cc:	File

This memorandum is intended to serve as an update to the approved traffic impact study performed by Olsson in August 2016 (*Olsson 2016*) for the La Vista City Centre project located on the northeast quadrant of 84th Street & Brentwood Drive. This memorandum documents the results of traffic impacts associated with the proposed land use update on Lot 13 of the previously approved La Vista City Centre project.

In the *Olsson 2016* study, Lot 13 was proposed to only contain an outdoor music venue and green space; and it was assumed site traffic would be isolated to weekend or off-peak hours. Based on an updated site plan, Lot 13 is proposed to include an indoor amphitheater in addition to the outdoor music venue. The operating times of the indoor venue provided by the owner suggest a portion of site traffic for this use will occur during the typical weekday PM peak period. The dates of the shows will vary based on the availability of musicians. The indoor amphitheater is intended to hold 150 concerts per year. Of the 150 concerts, it is estimated 15 will be at-capacity events. A separate special event traffic and parking plan should be prepared for these at-capacity and outdoor amphitheater events.

Based on conversations with the City of La Vista, the remaining 135 events are anticipated to generate 400 attendees arriving in the PM peak hour. It is assumed there will be two attendees per vehicle, resulting in 200 arriving vehicles in the PM peak period. These 200 entering vehicles were distributed throughout the network using the external trip distribution provided in the approved *Olsson 2016* study. The trip distribution and site trips for the indoor amphitheater are illustrated in **Figure A** and **Figure B** at the end of this memorandum.

Both opening day and long-range plus site volume scenarios were updated to include music venue traffic. A capacity analysis was performed for all intersections included in the Olsson report for opening day and long-range scenarios. Updated Opening Day (2020) and 2040 plus Site traffic volumes and capacity analysis summaries are shown in **Figures C-F** at the end of this memorandum.

Protected-permitted phasing for the southbound left-turning movement at 84th Street & City Centre Drive was included in both capacity analyses.

Results of the capacity analyses indicate signalized intersections and their respective turning movements are generally anticipated to operate similar to those shown in the *Olsson 2016* report with the addition of anticipated typical music venue site trips during weekday PM peak periods. The signal and individual turning movements at 84th Street & City Centre Drive are anticipated to operate at acceptable levels of service (LOS D or better) in the PM peak hour for both future year scenarios. The 95th percentile queue length for the southbound left-turning movements at this intersection is anticipated to be approximately 225 feet in the PM peak hour. This is an increase of approximately 100 feet from the queue reported in the *Olsson 2016* study. The available storage for this movement will be approximately 500 feet on opening day.

Based on the results of the updated analyses, it is recommended that a special event traffic and parking plan be developed for at-capacity music events. There are no additional recommended public roadway improvements as part of the proposed Lot 13 land use update.

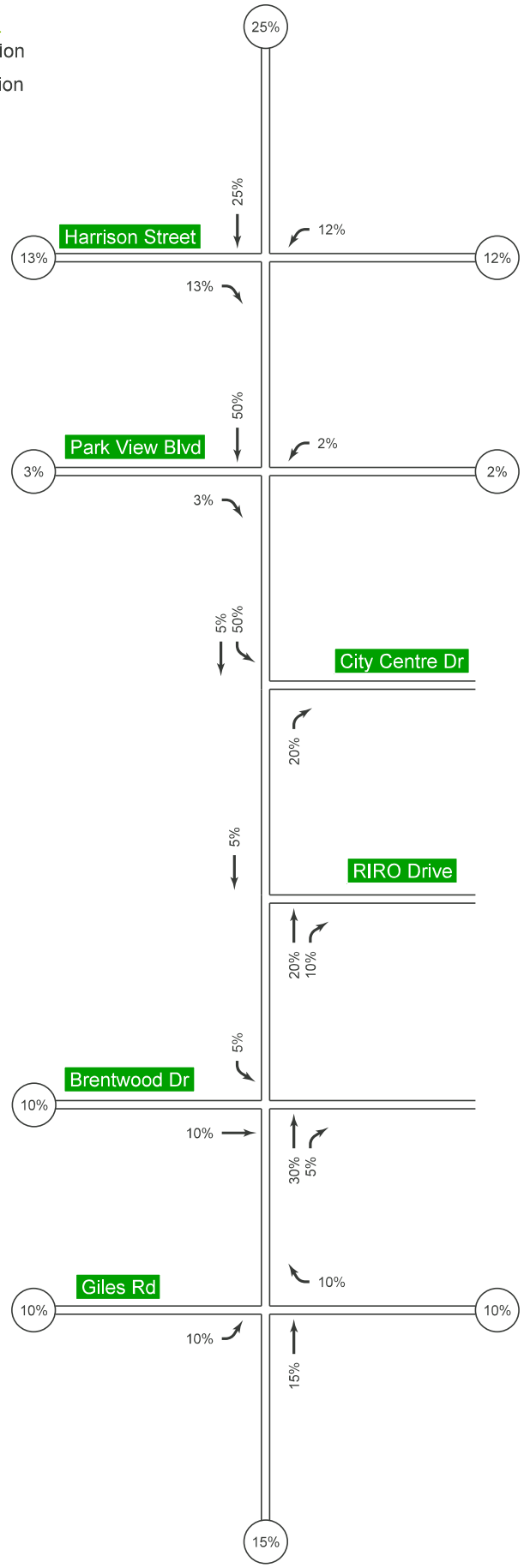
FIGURE A

Trip Distribution

LEGEND

XX% Entering Distribution

XX% External Distribution

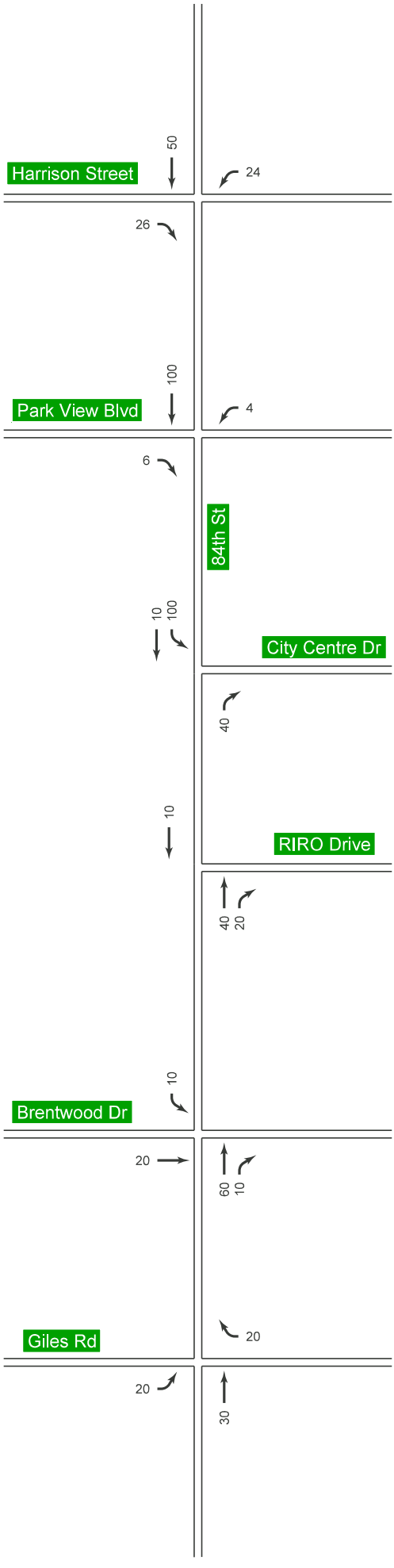


LEGEND

xx PM Entering Trips

FIGURE B

Primary
Site Trips



LEGEND

xx PM Peak Hour Volume

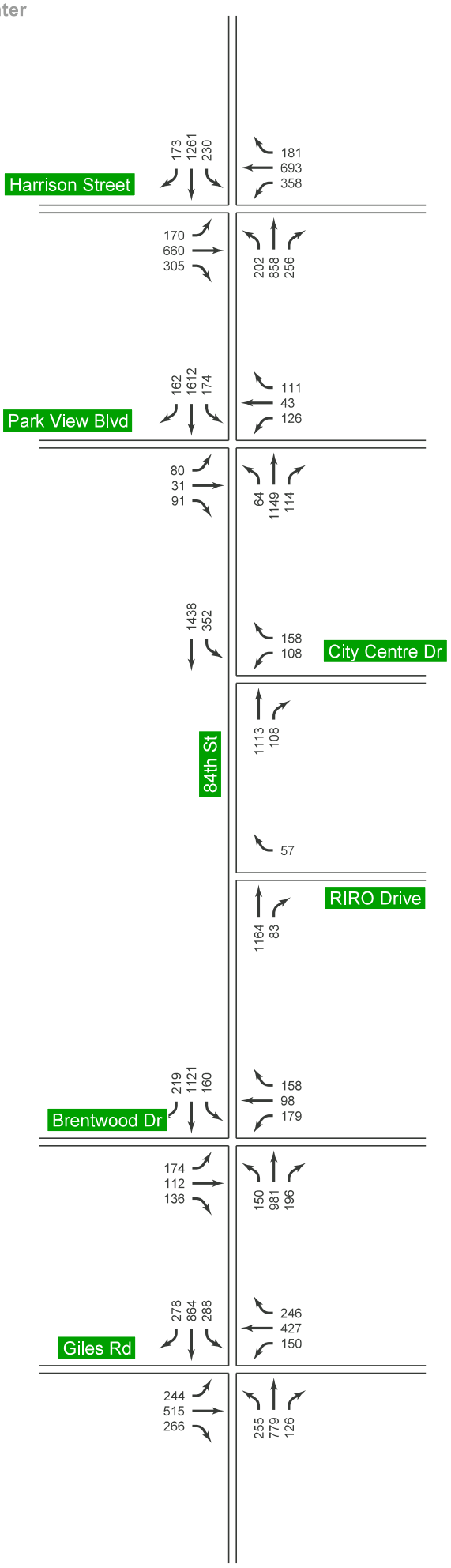


FIGURE C

Opening Day
Traffic Volumes
PM Peak Hour

LEGEND

xx PM Peak Hour Volume

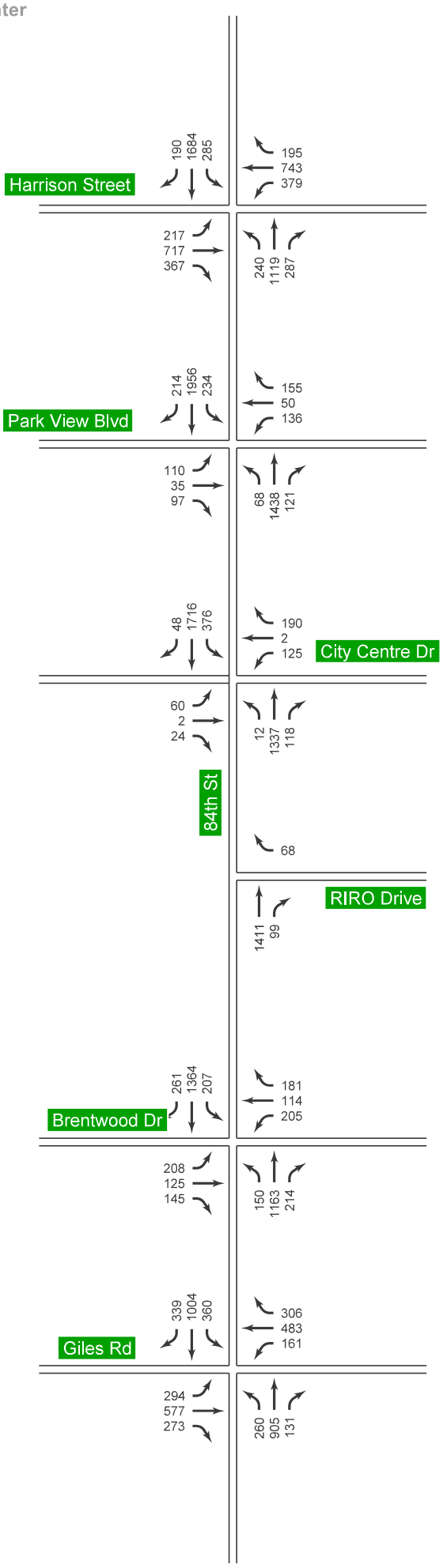


FIGURE D

2040 Plus Site
Traffic Volumes
PM Peak Hour

FIGURE E

Opening Day
Capacity Analysis
PM Peak Hour

LEGEND

- X — PM Signalized Intersection LOS
- x — PM Movement LOS
- STOP — Stop Controlled Intersection
- Stop Sign
- Lane Geometry

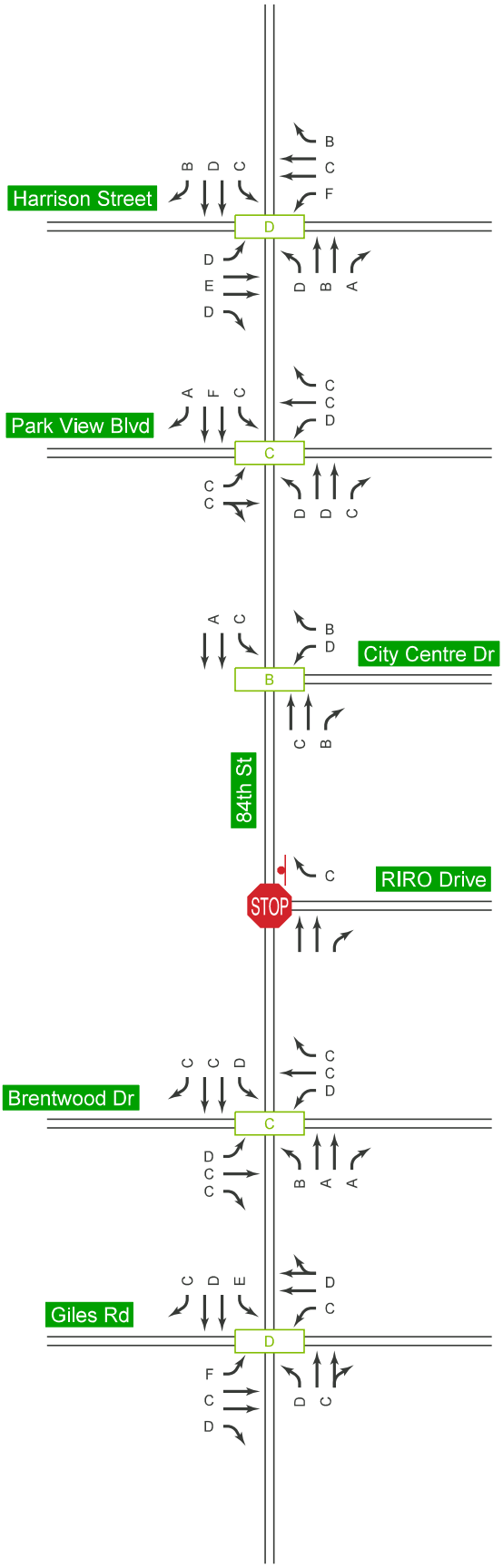
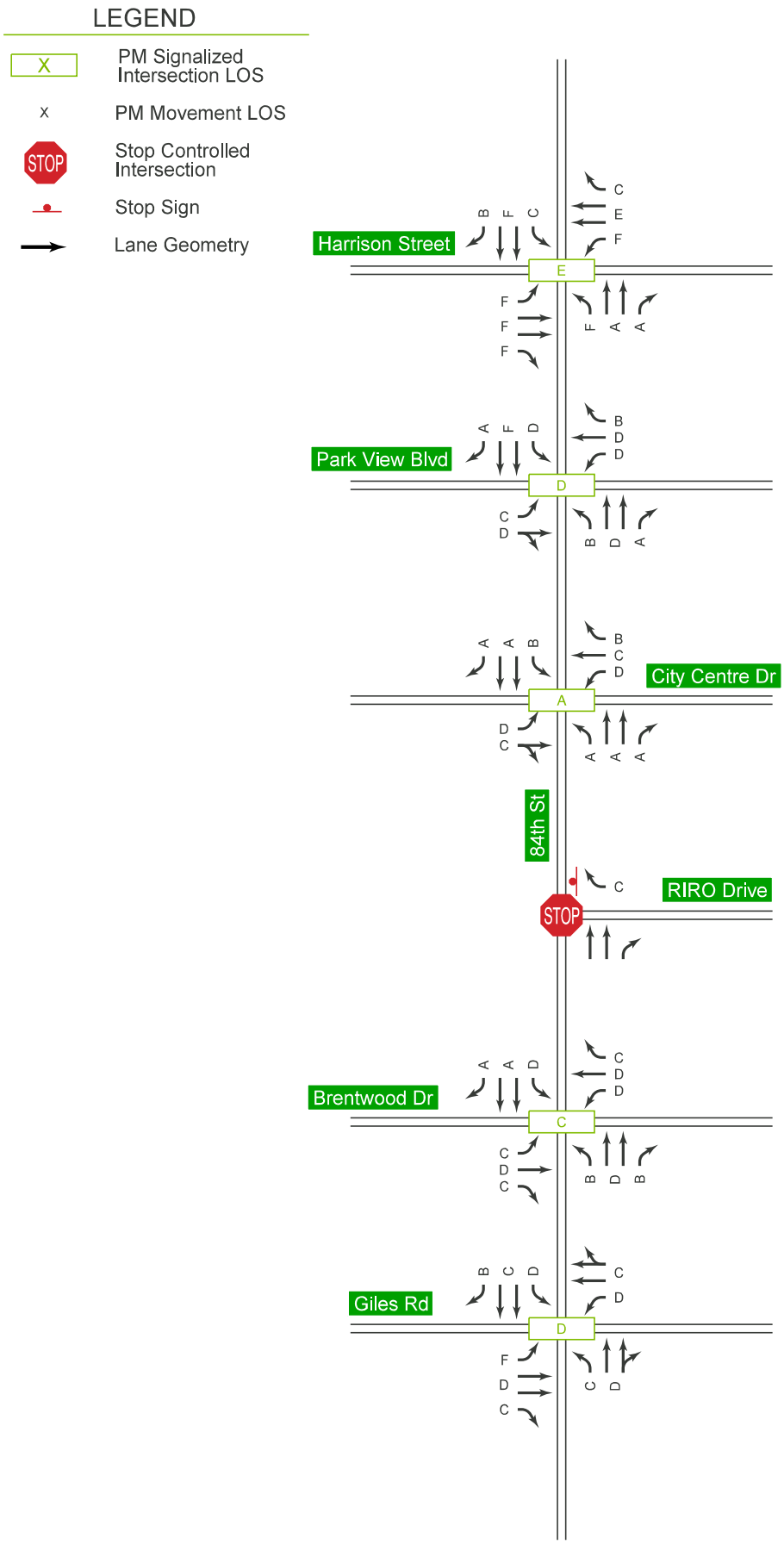


FIGURE F

2040 Plus Site
Capacity Analysis
PM Peak Hour



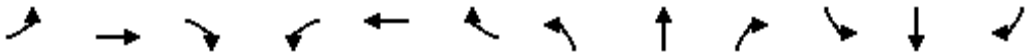
Intersection	
Int Delay, s/veh	0.3

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Vol, veh/h	0	57	1164	83	0	1546
Future Vol, veh/h	0	57	1164	83	0	1546
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	-	0	-	150	-	-
Veh in Median Storage, #	0	-	0	-	-	0
Grade, %	0	-	0	-	-	0
Peak Hour Factor	90	90	90	90	90	90
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	0	63	1293	92	0	1718

Major/Minor	Minor1		Major1		Major2	
Conflicting Flow All	-	647	0	0	-	-
Stage 1	-	-	-	-	-	-
Stage 2	-	-	-	-	-	-
Critical Hdwy	-	6.94	-	-	-	-
Critical Hdwy Stg 1	-	-	-	-	-	-
Critical Hdwy Stg 2	-	-	-	-	-	-
Follow-up Hdwy	-	3.32	-	-	-	-
Pot Cap-1 Maneuver	0	414	-	-	0	-
Stage 1	0	-	-	-	0	-
Stage 2	0	-	-	-	0	-
Platoon blocked, %			-	-		-
Mov Cap-1 Maneuver	-	414	-	-	-	-
Mov Cap-2 Maneuver	-	-	-	-	-	-
Stage 1	-	-	-	-	-	-
Stage 2	-	-	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s	15.3	0	0
HCM LOS	C		

Minor Lane/Major Mvmt	NBT	NBR	WBLn1	SBT
Capacity (veh/h)	-	-	414	-
HCM Lane V/C Ratio	-	-	0.153	-
HCM Control Delay (s)	-	-	15.3	-
HCM Lane LOS	-	-	C	-
HCM 95th %tile Q(veh)	-	-	0.5	-



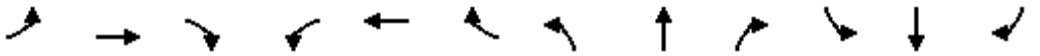
Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Group Flow (vph)	189	733	339	398	770	201	224	953	284	256	1401	192
v/c Ratio	0.80	0.98	0.54	1.14	0.78	0.27	0.91	0.73	0.30	0.85	0.94	0.21
Control Delay	47.6	65.4	17.3	114.9	36.7	10.5	64.8	13.0	1.9	43.8	38.3	5.1
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	47.6	65.4	17.3	114.9	36.7	10.5	64.8	13.0	1.9	43.8	38.3	5.1
Queue Length 50th (ft)	71	219	85	~208	212	42	83	42	0	86	390	21
Queue Length 95th (ft)	#155	#340	170	#387	281	86	m#174	142	m9	#217	#543	52
Internal Link Dist (ft)		1058			583			1057			815	
Turn Bay Length (ft)	250		160	180		110	180		500	210		150
Base Capacity (vph)	235	747	624	350	983	760	246	1303	947	305	1494	927
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.80	0.98	0.54	1.14	0.78	0.26	0.91	0.73	0.30	0.84	0.94	0.21

Intersection Summary

~ Volume exceeds capacity, queue is theoretically infinite.
Queue shown is maximum after two cycles.

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

m Volume for 95th percentile queue is metered by upstream signal.



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	170	660	305	358	693	181	202	858	256	230	1261	173
Future Volume (veh/h)	170	660	305	358	693	181	202	858	256	230	1261	173
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Ped-Bike Adj(A_pbT)	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870
Adj Flow Rate, veh/h	189	733	339	398	770	201	224	953	284	256	1401	192
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Percent Heavy Veh, %	2	2	2	2	2	2	2	2	2	2	2	2
Cap, veh/h	251	750	440	337	987	613	253	1349	831	373	1500	793
Arrive On Green	0.08	0.21	0.20	0.14	0.28	0.27	0.18	0.76	0.74	0.11	0.42	0.41
Sat Flow, veh/h	1781	3554	1585	1781	3554	1585	1781	3554	1585	1781	3554	1585
Grp Volume(v), veh/h	189	733	339	398	770	201	224	953	284	256	1401	192
Grp Sat Flow(s),veh/h/ln	1781	1777	1585	1781	1777	1585	1781	1777	1585	1781	1777	1585
Q Serve(g_s), s	7.0	18.5	17.7	13.0	18.0	8.0	7.3	12.5	5.0	7.7	33.8	6.2
Cycle Q Clear(g_c), s	7.0	18.5	17.7	13.0	18.0	8.0	7.3	12.5	5.0	7.7	33.8	6.2
Prop In Lane	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Lane Grp Cap(c), veh/h	251	750	440	337	987	613	253	1349	831	373	1500	793
V/C Ratio(X)	0.75	0.98	0.77	1.18	0.78	0.33	0.88	0.71	0.34	0.69	0.93	0.24
Avail Cap(c_a), veh/h	251	750	440	337	987	613	253	1349	831	396	1500	793
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	2.00	2.00	2.00	1.00	1.00	1.00
Upstream Filter(I)	1.00	1.00	1.00	1.00	1.00	1.00	0.68	0.68	0.68	1.00	1.00	1.00
Uniform Delay (d), s/veh	29.5	35.3	29.9	25.5	30.0	19.4	18.9	8.2	4.7	16.4	24.8	12.8
Incr Delay (d2), s/veh	12.1	27.1	8.1	107.4	4.1	0.3	21.5	2.1	0.8	4.6	12.0	0.7
Initial Q Delay(d3),s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(50%),veh/ln	4.0	10.3	7.2	15.3	7.7	2.8	3.7	2.9	1.2	3.2	15.1	2.1
Unsig. Movement Delay, s/veh												
LnGrp Delay(d),s/veh	41.7	62.4	38.0	132.9	34.0	19.7	40.5	10.4	5.5	21.0	36.8	13.5
LnGrp LOS	D	E	D	F	C	B	D	B	A	C	D	B
Approach Vol, veh/h		1261			1369			1461			1849	
Approach Delay, s/veh		52.7			60.7			14.0			32.2	
Approach LOS		D			E			B			C	

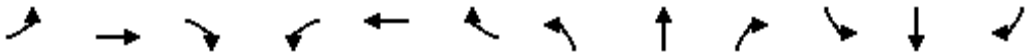
Timer - Assigned Phs	1	2	3	4	5	6	7	8
Phs Duration (G+Y+Rc), s	16.0	23.0	9.0	42.0	10.0	29.0	12.8	38.2
Change Period (Y+Rc), s	3.0	6.0	3.0	6.0	3.0	6.0	3.0	6.0
Max Green Setting (Gmax), s	13.0	17.0	6.0	36.0	7.0	23.0	11.0	31.0
Max Q Clear Time (g_c+I1), s	15.0	20.5	9.3	35.8	9.0	20.0	9.7	14.5
Green Ext Time (p_c), s	0.0	0.0	0.0	0.1	0.0	1.4	0.1	5.4

Intersection Summary	
HCM 6th Ctrl Delay	38.7
HCM 6th LOS	D

Lane Group	EBL	EBT	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Group Flow (vph)	89	135	140	48	123	71	1277	127	193	1791	181
v/c Ratio	0.37	0.33	0.73	0.13	0.29	0.42	0.74	0.15	0.43	0.82	0.18
Control Delay	35.3	11.5	56.0	28.1	6.2	31.1	27.4	10.6	17.1	13.4	4.8
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	35.3	11.5	56.0	28.1	6.2	31.1	27.4	10.6	17.1	13.4	4.8
Queue Length 50th (ft)	45	16	76	23	0	41	405	36	38	216	7
Queue Length 95th (ft)	83	58	131	48	36	m58	481	m64	m52	m#354	m20
Internal Link Dist (ft)		619		685			1678			1057	
Turn Bay Length (ft)	200		150		50	200		125	200		100
Base Capacity (vph)	330	515	261	496	519	189	1730	823	446	2171	1001
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.27	0.26	0.54	0.10	0.24	0.38	0.74	0.15	0.43	0.82	0.18

Intersection Summary

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.
m Volume for 95th percentile queue is metered by upstream signal.



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	80	31	91	126	43	111	64	1149	114	174	1612	163
Future Volume (veh/h)	80	31	91	126	43	111	64	1149	114	174	1612	163
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Ped-Bike Adj(A_pbT)	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870
Adj Flow Rate, veh/h	89	34	101	140	48	123	71	1277	127	193	1791	181
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Percent Heavy Veh, %	2	2	2	2	2	2	2	2	2	2	2	2
Cap, veh/h	305	95	281	251	426	361	115	1500	669	308	1726	770
Arrive On Green	0.21	0.23	0.22	0.21	0.23	0.23	0.02	0.14	0.14	0.24	0.97	0.97
Sat Flow, veh/h	1214	415	1233	1254	1870	1585	1781	3554	1585	1781	3554	1585
Grp Volume(v), veh/h	89	0	135	140	48	123	71	1277	127	193	1791	181
Grp Sat Flow(s),veh/h/ln	1214	0	1648	1254	1870	1585	1781	1777	1585	1781	1777	1585
Q Serve(g_s), s	5.8	0.0	6.2	9.8	1.8	5.8	3.6	31.6	6.4	3.6	43.7	0.4
Cycle Q Clear(g_c), s	7.6	0.0	6.2	16.0	1.8	5.8	3.6	31.6	6.4	3.6	43.7	0.4
Prop In Lane	1.00		0.75	1.00		1.00	1.00		1.00	1.00		1.00
Lane Grp Cap(c), veh/h	305	0	376	251	426	361	115	1500	669	308	1726	770
V/C Ratio(X)	0.29	0.00	0.36	0.56	0.11	0.34	0.62	0.85	0.19	0.63	1.04	0.24
Avail Cap(c_a), veh/h	352	0	440	300	499	423	188	1560	696	407	1836	819
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	0.33	0.33	0.33	2.00	2.00	2.00
Upstream Filter(I)	1.00	0.00	1.00	1.00	1.00	1.00	0.69	0.69	0.69	0.29	0.29	0.29
Uniform Delay (d), s/veh	32.2	0.0	29.5	37.8	27.5	29.1	42.9	36.0	25.1	30.3	1.3	0.7
Incr Delay (d2), s/veh	0.5	0.0	0.6	1.9	0.1	0.6	3.7	4.4	0.4	0.6	23.0	0.0
Initial Q Delay(d3),s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(50%),veh/ln	1.7	0.0	2.5	3.1	0.8	2.3	1.7	15.7	2.4	3.2	6.0	0.1
Unsig. Movement Delay, s/veh												
LnGrp Delay(d),s/veh	32.7	0.0	30.1	39.7	27.6	29.6	46.6	40.4	25.6	30.9	24.3	0.7
LnGrp LOS	C	A	C	D	C	C	D	D	C	C	F	A
Approach Vol, veh/h		224			311			1475			2165	
Approach Delay, s/veh		31.2			33.9			39.4			22.9	
Approach LOS		C			C			D			C	

Timer - Assigned Phs	1	2		4	5	6		8				
Phs Duration (G+Y+Rc), s	8.8	48.6		24.0	15.9	41.5		24.0				
Change Period (Y+Rc), s	3.0	5.5		5.5	5.5	5.5		5.5				
Max Green Setting (Gmax), s	9.5	44.5		22.0	14.0	37.5		22.0				
Max Q Clear Time (g_c+I1), s	5.6	45.7		18.0	5.6	33.6		9.6				
Green Ext Time (p_c), s	0.0	0.0		0.5	0.4	2.4		0.7				

Intersection Summary			
HCM 6th Ctrl Delay		30.0	
HCM 6th LOS		C	

Lane Group	WBL	WBR	NBT	NBR	SBL	SBT
Lane Group Flow (vph)	120	176	1237	120	391	1598
v/c Ratio	0.49	0.24	0.73	0.15	0.72	0.57
Control Delay	43.6	13.2	23.3	5.7	20.9	1.5
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	43.6	13.2	23.3	5.7	20.9	1.5
Queue Length 50th (ft)	64	47	310	15	152	8
Queue Length 95th (ft)	119	90	394	43	m222	24
Internal Link Dist (ft)	401		425			1678
Turn Bay Length (ft)		100		150	250	
Base Capacity (vph)	246	747	1700	801	541	2812
Starvation Cap Reductn	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0
Reduced v/c Ratio	0.49	0.24	0.73	0.15	0.72	0.57

Intersection Summary

m Volume for 95th percentile queue is metered by upstream signal.

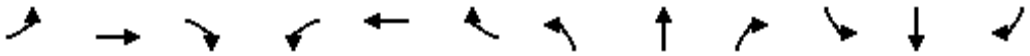
Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Volume (veh/h)	108	158	1113	108	352	1438
Future Volume (veh/h)	108	158	1113	108	352	1438
Initial Q (Qb), veh	0	0	0	0	0	0
Ped-Bike Adj(A_pbT)	1.00	1.00		1.00	1.00	
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach	No		No			No
Adj Sat Flow, veh/h/ln	1900	1900	1885	1900	1707	1885
Adj Flow Rate, veh/h	120	176	1237	120	391	1598
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Percent Heavy Veh, %	0	0	1	0	13	1
Cap, veh/h	241	658	1699	746	573	2826
Arrive On Green	0.13	0.13	0.32	0.31	0.28	0.79
Sat Flow, veh/h	1810	1610	3676	1610	1626	3676
Grp Volume(v), veh/h	120	176	1237	120	391	1598
Grp Sat Flow(s),veh/h/ln	1810	1610	1791	1610	1626	1791
Q Serve(g_s), s	5.5	0.0	27.6	4.9	11.5	15.3
Cycle Q Clear(g_c), s	5.5	0.0	27.6	4.9	11.5	15.3
Prop In Lane	1.00	1.00		1.00	1.00	
Lane Grp Cap(c), veh/h	241	658	1699	746	573	2826
V/C Ratio(X)	0.50	0.27	0.73	0.16	0.68	0.57
Avail Cap(c_a), veh/h	247	664	1699	746	577	2826
HCM Platoon Ratio	1.00	1.00	0.67	0.67	1.00	1.00
Upstream Filter(I)	1.00	1.00	1.00	1.00	0.47	0.47
Uniform Delay (d), s/veh	36.2	17.7	25.5	18.3	25.3	3.6
Incr Delay (d2), s/veh	1.6	0.2	2.8	0.5	1.5	0.4
Initial Q Delay(d3),s/veh	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(50%),veh/ln	2.5	4.4	12.4	1.8	6.7	2.6
Unsig. Movement Delay, s/veh						
LnGrp Delay(d),s/veh	37.8	17.9	28.3	18.8	26.8	4.0
LnGrp LOS	D	B	C	B	C	A
Approach Vol, veh/h	296		1357			1989
Approach Delay, s/veh	25.9		27.5			8.5
Approach LOS	C		C			A

Timer - Assigned Phs		2		4	5	6
Phs Duration (G+Y+Rc), s		74.5		15.5	28.3	46.2
Change Period (Y+Rc), s		5.5		5.5	5.5	* 5.5
Max Green Setting (Gmax), s		68.7		10.3	23.0	* 41
Max Q Clear Time (g_c+I1), s		17.3		7.5	13.5	29.6
Green Ext Time (p_c), s		11.2		0.3	1.1	5.0

Intersection Summary	
HCM 6th Ctrl Delay	17.0
HCM 6th LOS	B

Notes

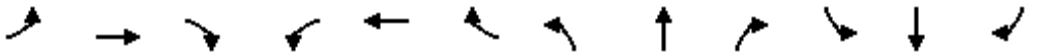
* HCM 6th computational engine requires equal clearance times for the phases crossing the barrier.



Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Group Flow (vph)	193	124	151	199	109	176	167	1090	218	178	1246	243
v/c Ratio	0.71	0.27	0.30	0.77	0.24	0.39	0.54	0.49	0.19	0.70	0.63	0.25
Control Delay	46.6	27.7	5.8	52.3	27.1	14.3	9.3	7.4	2.1	38.2	22.0	5.7
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	46.6	27.7	5.8	52.3	27.1	14.3	9.3	7.4	2.1	38.2	22.0	5.7
Queue Length 50th (ft)	102	57	0	107	50	35	25	187	14	98	352	17
Queue Length 95th (ft)	161	94	41	169	84	81	m52	m252	m32	#218	444	95
Internal Link Dist (ft)		652			424			1210			503	
Turn Bay Length (ft)	150		150	100		100	100		150	250		250
Base Capacity (vph)	366	601	609	348	601	569	321	2219	1171	255	1969	971
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.53	0.21	0.25	0.57	0.18	0.31	0.52	0.49	0.19	0.70	0.63	0.25

Intersection Summary

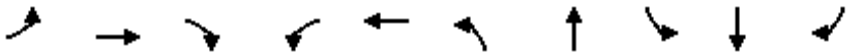
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.
m Volume for 95th percentile queue is metered by upstream signal.



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	174	112	136	179	98	158	150	981	196	160	1121	219
Future Volume (veh/h)	174	112	136	179	98	158	150	981	196	160	1121	219
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Ped-Bike Adj(A_pbT)	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1900	1900	1885	1900	1900	1870	1900	1737	1900	1841	1870	1841
Adj Flow Rate, veh/h	193	124	151	199	109	176	167	1090	218	178	1246	243
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Percent Heavy Veh, %	0	0	1	0	0	2	0	11	0	4	2	4
Cap, veh/h	315	527	443	310	527	440	265	2128	1038	265	1951	857
Arrive On Green	0.26	0.28	0.28	0.26	0.28	0.28	0.06	0.64	0.64	0.17	0.18	0.18
Sat Flow, veh/h	1112	1900	1598	1122	1900	1585	1810	3300	1610	414	3554	1560
Grp Volume(v), veh/h	193	124	151	199	109	176	167	1090	218	178	1246	243
Grp Sat Flow(s),veh/h/ln	1112	1900	1598	1122	1900	1585	1810	1650	1610	414	1777	1560
Q Serve(g_s), s	14.9	4.5	6.8	15.4	4.0	8.1	3.6	15.8	5.0	38.4	29.2	12.1
Cycle Q Clear(g_c), s	18.9	4.5	6.8	20.0	4.0	8.1	3.6	15.8	5.0	45.6	29.2	12.1
Prop In Lane	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Lane Grp Cap(c), veh/h	315	527	443	310	527	440	265	2128	1038	265	1951	857
V/C Ratio(X)	0.61	0.24	0.34	0.64	0.21	0.40	0.63	0.51	0.21	0.67	0.64	0.28
Avail Cap(c_a), veh/h	358	602	506	354	602	502	324	2128	1038	265	1951	857
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.33	0.33	0.33
Upstream Filter(I)	1.00	1.00	1.00	1.00	1.00	1.00	0.56	0.56	0.56	1.00	1.00	1.00
Uniform Delay (d), s/veh	33.9	25.1	25.9	34.6	24.9	26.4	17.1	8.5	6.6	40.0	28.6	21.6
Incr Delay (d2), s/veh	2.5	0.2	0.5	3.2	0.2	0.6	1.5	0.5	0.3	12.8	1.6	0.8
Initial Q Delay(d3),s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(50%),veh/ln	4.2	2.1	2.6	4.4	1.8	3.1	1.7	4.5	1.4	5.1	14.0	4.9
Unsig. Movement Delay, s/veh												
LnGrp Delay(d),s/veh	36.3	25.4	26.4	37.8	25.1	27.0	18.6	9.0	6.8	52.7	30.2	22.4
LnGrp LOS	D	C	C	D	C	C	B	A	A	D	C	C
Approach Vol, veh/h		468			484			1475			1667	
Approach Delay, s/veh		30.2			31.0			9.8			31.5	
Approach LOS		C			C			A			C	

Timer - Assigned Phs	1	2		4		6		8				
Phs Duration (G+Y+Rc), s	8.6	52.9		28.5		61.5		28.5				
Change Period (Y+Rc), s	3.0	5.5		5.5		5.5		5.5				
Max Green Setting (Gmax), s	8.5	41.0		26.5		52.5		26.5				
Max Q Clear Time (g_c+I1), s	5.6	47.6		22.0		17.8		20.9				
Green Ext Time (p_c), s	0.1	0.0		1.0		7.3		1.1				

Intersection Summary												
HCM 6th Ctrl Delay			23.4									
HCM 6th LOS			C									

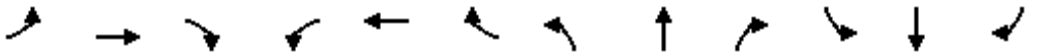


Lane Group	EBL	EBT	EBR	WBL	WBT	NBL	NBT	SBL	SBT	SBR
Lane Group Flow (vph)	271	572	296	167	747	283	1006	320	960	309
v/c Ratio	1.08	0.65	0.52	0.64	0.81	0.89	0.67	1.16	0.68	0.35
Control Delay	107.4	34.0	11.2	31.7	34.1	47.7	22.9	119.2	23.5	12.4
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	107.4	34.0	11.2	31.7	34.1	47.7	22.9	119.2	23.5	12.4
Queue Length 50th (ft)	~111	151	30	63	174	93	229	~149	278	126
Queue Length 95th (ft)	#267	206	102	#111	242	#245	298	#315	341	164
Internal Link Dist (ft)		704			836		3898		1210	
Turn Bay Length (ft)	200		150	100		325		300		300
Base Capacity (vph)	250	924	581	262	964	318	1496	277	1414	884
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	1.08	0.62	0.51	0.64	0.77	0.89	0.67	1.16	0.68	0.35

Intersection Summary

~ Volume exceeds capacity, queue is theoretically infinite.
Queue shown is maximum after two cycles.

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	244	515	266	150	427	246	255	779	126	288	864	278
Future Volume (veh/h)	244	515	266	150	427	246	255	779	126	288	864	278
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Ped-Bike Adj(A_pbT)	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870
Adj Flow Rate, veh/h	271	572	296	167	474	273	283	866	140	320	960	309
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Percent Heavy Veh, %	2	2	2	2	2	2	2	2	2	2	2	2
Cap, veh/h	256	911	406	297	558	320	330	1325	214	323	1418	738
Arrive On Green	0.09	0.26	0.26	0.09	0.26	0.25	0.11	0.43	0.42	0.03	0.13	0.12
Sat Flow, veh/h	1781	3554	1585	1781	2176	1247	1781	3063	495	1781	3554	1585
Grp Volume(v), veh/h	271	572	296	167	387	360	283	502	504	320	960	309
Grp Sat Flow(s),veh/h/ln	1781	1777	1585	1781	1777	1646	1781	1777	1781	1781	1777	1585
Q Serve(g_s), s	8.0	12.8	15.4	6.3	18.6	18.8	8.3	20.1	20.2	7.0	23.2	14.1
Cycle Q Clear(g_c), s	8.0	12.8	15.4	6.3	18.6	18.8	8.3	20.1	20.2	7.0	23.2	14.1
Prop In Lane	1.00		1.00	1.00		0.76	1.00		0.28	1.00		1.00
Lane Grp Cap(c), veh/h	256	911	406	297	456	422	330	768	770	323	1418	738
V/C Ratio(X)	1.06	0.63	0.73	0.56	0.85	0.85	0.86	0.65	0.65	0.99	0.68	0.42
Avail Cap(c_a), veh/h	256	928	414	297	464	430	330	768	770	323	1418	738
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.33	0.33	0.33
Upstream Filter(I)	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.75	0.75	0.75
Uniform Delay (d), s/veh	29.4	29.7	30.6	24.0	31.8	32.2	19.0	20.2	20.3	26.5	33.5	23.3
Incr Delay (d2), s/veh	72.0	1.3	6.2	2.4	13.6	15.1	19.5	4.3	4.3	41.1	2.0	1.3
Initial Q Delay(d3),s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(50%),veh/ln	6.8	5.4	6.3	2.7	9.4	9.0	4.7	8.3	8.4	7.0	11.2	6.1
Unsig. Movement Delay, s/veh												
LnGrp Delay(d),s/veh	101.4	31.0	36.8	26.4	45.4	47.4	38.5	24.5	24.6	67.6	35.5	24.6
LnGrp LOS	F	C	D	C	D	D	D	C	C	E	D	C
Approach Vol, veh/h		1139			914			1289			1589	
Approach Delay, s/veh		49.3			42.7			27.6			39.9	
Approach LOS		D			D			C			D	

Timer - Assigned Phs	1	2	3	4	5	6	7	8
Phs Duration (G+Y+Rc), s	13.0	39.4	11.0	26.6	10.0	42.4	11.0	26.6
Change Period (Y+Rc), s	3.0	5.5	3.0	5.5	3.0	5.5	3.0	5.5
Max Green Setting (Gmax), s	10.0	33.5	8.0	21.5	7.0	36.5	8.0	21.5
Max Q Clear Time (g_c+I1), s	10.3	25.2	8.3	17.4	9.0	22.2	10.0	20.8
Green Ext Time (p_c), s	0.0	3.8	0.0	1.6	0.0	3.7	0.0	0.3

Intersection Summary	
HCM 6th Ctrl Delay	39.4
HCM 6th LOS	D

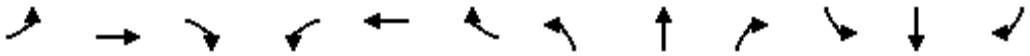
Intersection	
Int Delay, s/veh	0.4

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Traffic Vol, veh/h	0	68	1411	99	0	1865
Future Vol, veh/h	0	68	1411	99	0	1865
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	-	0	-	150	-	-
Veh in Median Storage, #	0	-	0	-	-	0
Grade, %	0	-	0	-	-	0
Peak Hour Factor	90	90	90	90	90	90
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	0	76	1568	110	0	2072

Major/Minor	Minor1		Major1		Major2	
Conflicting Flow All	-	784	0	0	-	-
Stage 1	-	-	-	-	-	-
Stage 2	-	-	-	-	-	-
Critical Hdwy	-	6.94	-	-	-	-
Critical Hdwy Stg 1	-	-	-	-	-	-
Critical Hdwy Stg 2	-	-	-	-	-	-
Follow-up Hdwy	-	3.32	-	-	-	-
Pot Cap-1 Maneuver	0	336	-	-	0	-
Stage 1	0	-	-	-	0	-
Stage 2	0	-	-	-	0	-
Platoon blocked, %			-	-		-
Mov Cap-1 Maneuver	-	336	-	-	-	-
Mov Cap-2 Maneuver	-	-	-	-	-	-
Stage 1	-	-	-	-	-	-
Stage 2	-	-	-	-	-	-

Approach	WB	NB	SB
HCM Control Delay, s	18.8	0	0
HCM LOS	C		

Minor Lane/Major Mvmt	NBT	NBR	WBLn1	SBT
Capacity (veh/h)	-	-	336	-
HCM Lane V/C Ratio	-	-	0.225	-
HCM Control Delay (s)	-	-	18.8	-
HCM Lane LOS	-	-	C	-
HCM 95th %tile Q(veh)	-	-	0.8	-



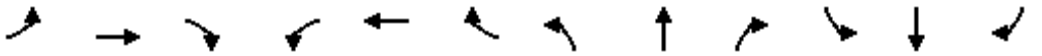
Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Group Flow (vph)	241	797	408	421	826	217	267	1243	319	317	1871	211
v/c Ratio	1.11	1.19	0.71	1.44	1.00	0.31	1.18	0.83	0.33	1.04	1.08	0.21
Control Delay	122.7	135.3	25.5	239.7	67.5	13.0	133.5	18.5	1.0	85.9	71.6	4.3
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	122.7	135.3	25.5	239.7	67.5	13.0	133.5	18.5	1.0	85.9	71.6	4.3
Queue Length 50th (ft)	~118	~291	132	~271	~248	52	~135	143	0	~140	~632	22
Queue Length 95th (ft)	#240	#407	242	#454	#377	104	m#191	m228	m1	#305	#770	51
Internal Link Dist (ft)		1058			583			1057			815	
Turn Bay Length (ft)	250		160	180		110	180		500	210		150
Base Capacity (vph)	217	668	576	293	825	693	226	1494	977	305	1730	1009
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	1.11	1.19	0.71	1.44	1.00	0.31	1.18	0.83	0.33	1.04	1.08	0.21

Intersection Summary

~ Volume exceeds capacity, queue is theoretically infinite.
Queue shown is maximum after two cycles.

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

m Volume for 95th percentile queue is metered by upstream signal.



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	217	717	367	379	743	195	240	1119	287	285	1684	190
Future Volume (veh/h)	217	717	367	379	743	195	240	1119	287	285	1684	190
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Ped-Bike Adj(A_pbT)	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870
Adj Flow Rate, veh/h	241	797	408	421	826	217	267	1243	319	317	1871	211
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Percent Heavy Veh, %	2	2	2	2	2	2	2	2	2	2	2	2
Cap, veh/h	199	671	387	278	829	562	219	1505	847	369	1737	881
Arrive On Green	0.07	0.19	0.18	0.11	0.23	0.22	0.16	0.85	0.82	0.12	0.49	0.48
Sat Flow, veh/h	1781	3554	1585	1781	3554	1585	1781	3554	1585	1781	3554	1585
Grp Volume(v), veh/h	241	797	408	421	826	217	267	1243	319	317	1871	211
Grp Sat Flow(s),veh/h/ln	1781	1777	1585	1781	1777	1585	1781	1777	1585	1781	1777	1585
Q Serve(g_s), s	6.0	17.0	16.0	10.0	20.9	9.2	7.0	16.0	4.2	8.9	44.0	6.1
Cycle Q Clear(g_c), s	6.0	17.0	16.0	10.0	20.9	9.2	7.0	16.0	4.2	8.9	44.0	6.1
Prop In Lane	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Lane Grp Cap(c), veh/h	199	671	387	278	829	562	219	1505	847	369	1737	881
V/C Ratio(X)	1.21	1.19	1.05	1.51	1.00	0.39	1.22	0.83	0.38	0.86	1.08	0.24
Avail Cap(c_a), veh/h	199	671	387	278	829	562	219	1505	847	371	1737	881
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	2.00	2.00	2.00	1.00	1.00	1.00
Upstream Filter(I)	1.00	1.00	1.00	1.00	1.00	1.00	0.46	0.46	0.46	1.00	1.00	1.00
Uniform Delay (d), s/veh	34.2	36.5	34.0	29.3	34.5	21.7	20.3	5.2	3.2	17.1	23.0	10.3
Incr Delay (d2), s/veh	132.8	98.8	60.3	249.4	30.2	0.4	117.5	2.5	0.6	17.9	45.6	0.6
Initial Q Delay(d3),s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(50%),veh/ln	8.6	16.1	14.4	23.8	11.9	3.2	9.3	2.5	1.0	4.8	26.6	2.0
Unsig. Movement Delay, s/veh												
LnGrp Delay(d),s/veh	167.1	135.3	94.3	278.7	64.7	22.2	137.8	7.7	3.8	35.0	68.6	10.9
LnGrp LOS	F	F	F	F	E	C	F	A	A	C	F	B
Approach Vol, veh/h		1446			1464			1829			2399	
Approach Delay, s/veh		129.0			119.9			26.0			59.1	
Approach LOS		F			F			C			E	

Timer - Assigned Phs	1	2	3	4	5	6	7	8
Phs Duration (G+Y+Rc), s	13.0	21.0	8.0	48.0	9.0	25.0	13.9	42.1
Change Period (Y+Rc), s	3.0	6.0	3.0	6.0	3.0	6.0	3.0	6.0
Max Green Setting (Gmax), s	10.0	15.0	5.0	42.0	6.0	19.0	11.0	36.0
Max Q Clear Time (g_c+I1), s	12.0	19.0	9.0	46.0	8.0	22.9	10.9	18.0
Green Ext Time (p_c), s	0.0	0.0	0.0	0.0	0.0	0.0	0.0	7.5

Intersection Summary	
HCM 6th Ctrl Delay	77.3
HCM 6th LOS	E

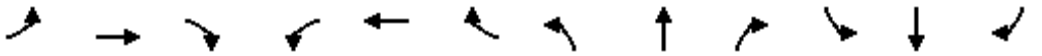
Lane Group	EBL	EBT	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Group Flow (vph)	122	147	151	56	172	76	1598	134	260	2173	238
v/c Ratio	0.41	0.47	0.65	0.19	0.32	0.34	0.91	0.15	0.88	1.08	0.25
Control Delay	32.5	17.5	43.0	36.8	7.5	11.5	27.2	2.7	30.4	55.6	3.5
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	32.5	17.5	43.0	36.8	7.5	11.5	27.2	2.7	30.4	55.6	3.5
Queue Length 50th (ft)	56	20	71	29	15	19	508	4	85	~751	12
Queue Length 95th (ft)	104	76	#141	65	53	m31	#603	m21	m79	m#517	m9
Internal Link Dist (ft)		619		685			1678			1057	
Turn Bay Length (ft)	200		150		50	200		125	200		100
Base Capacity (vph)	294	314	234	298	543	226	1781	875	297	2005	951
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.41	0.47	0.65	0.19	0.32	0.34	0.90	0.15	0.88	1.08	0.25

Intersection Summary

~ Volume exceeds capacity, queue is theoretically infinite.
Queue shown is maximum after two cycles.

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

m Volume for 95th percentile queue is metered by upstream signal.



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	110	35	97	136	50	155	68	1438	121	234	1956	214
Future Volume (veh/h)	110	35	97	136	50	155	68	1438	121	234	1956	214
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Ped-Bike Adj(A_pbT)	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870
Adj Flow Rate, veh/h	122	39	108	151	56	172	76	1598	134	260	2173	238
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Percent Heavy Veh, %	2	2	2	2	2	2	2	2	2	2	2	2
Cap, veh/h	316	58	162	251	249	391	252	1775	792	286	1962	875
Arrive On Green	0.08	0.13	0.12	0.08	0.13	0.13	0.02	0.16	0.16	0.23	1.00	1.00
Sat Flow, veh/h	1781	438	1214	1781	1870	1585	1781	3554	1585	1781	3554	1585
Grp Volume(v), veh/h	122	0	147	151	56	172	76	1598	134	260	2173	238
Grp Sat Flow(s),veh/h/ln	1781	0	1652	1781	1870	1585	1781	1777	1585	1781	1777	1585
Q Serve(g_s), s	5.4	0.0	7.6	6.8	2.4	1.2	2.2	39.7	3.7	8.4	0.0	0.0
Cycle Q Clear(g_c), s	5.4	0.0	7.6	6.8	2.4	1.2	2.2	39.7	3.7	8.4	0.0	0.0
Prop In Lane	1.00		0.73	1.00		1.00	1.00		1.00	1.00		1.00
Lane Grp Cap(c), veh/h	316	0	220	251	249	391	252	1775	792	286	1962	875
V/C Ratio(X)	0.39	0.00	0.67	0.60	0.22	0.44	0.30	0.90	0.17	0.91	1.11	0.27
Avail Cap(c_a), veh/h	316	0	220	251	249	391	273	1789	798	286	1962	875
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	0.33	0.33	0.33	2.00	2.00	2.00
Upstream Filter(I)	1.00	0.00	1.00	1.00	1.00	1.00	0.65	0.65	0.65	0.09	0.09	0.09
Uniform Delay (d), s/veh	31.8	0.0	37.5	32.7	34.8	14.1	14.1	35.4	6.7	32.7	0.0	0.0
Incr Delay (d2), s/veh	0.8	0.0	7.5	4.0	0.5	0.8	0.4	5.3	0.3	4.4	49.2	0.0
Initial Q Delay(d3),s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(50%),veh/ln	2.4	0.0	3.6	3.2	1.1	2.1	0.8	19.8	2.4	4.9	13.4	0.0
Unsig. Movement Delay, s/veh												
LnGrp Delay(d),s/veh	32.6	0.0	44.9	36.7	35.3	14.8	14.5	40.7	7.0	37.2	49.2	0.0
LnGrp LOS	C	A	D	D	D	B	B	D	A	D	F	A
Approach Vol, veh/h		269			379			1808			2671	
Approach Delay, s/veh		39.3			26.6			37.1			43.6	
Approach LOS		D			C			D			D	

Timer - Assigned Phs	1	2	3	4	5	6	7	8
Phs Duration (G+Y+Rc), s	9.0	53.2	12.0	15.5	13.7	48.4	12.0	15.5
Change Period (Y+Rc), s	3.0	5.5	5.0	5.5	5.5	5.5	5.0	5.5
Max Green Setting (Gmax), s	7.0	47.0	7.0	10.0	8.2	43.3	7.0	10.0
Max Q Clear Time (g_c+I1), s	4.2	2.0	7.4	4.4	10.4	41.7	8.8	9.6
Green Ext Time (p_c), s	0.0	22.5	0.0	0.4	0.0	1.3	0.0	0.0

Intersection Summary	
HCM 6th Ctrl Delay	39.9
HCM 6th LOS	D

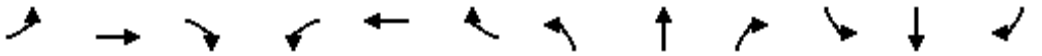
Lane Group	EBL	EBT	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Group Flow (vph)	67	29	139	2	211	13	1486	131	418	1907	53
v/c Ratio	0.38	0.13	0.65	0.01	0.33	0.16	0.77	0.14	1.05	0.69	0.04
Control Delay	43.0	16.1	51.6	34.0	18.2	14.2	11.0	3.1	61.3	2.4	0.0
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	43.0	16.1	51.6	34.0	18.2	14.2	11.0	3.1	61.3	2.4	0.0
Queue Length 50th (ft)	35	1	75	1	69	3	141	1	~224	5	1
Queue Length 95th (ft)	76	26	#152	8	125	m5	m207	m6	m#203	m6	m1
Internal Link Dist (ft)		358		401			425			1678	
Turn Bay Length (ft)	100		100		100	275		150	250		150
Base Capacity (vph)	180	228	218	248	640	82	1938	904	398	2772	1206
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.37	0.13	0.64	0.01	0.33	0.16	0.77	0.14	1.05	0.69	0.04

Intersection Summary

~ Volume exceeds capacity, queue is theoretically infinite.
Queue shown is maximum after two cycles.

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

m Volume for 95th percentile queue is metered by upstream signal.



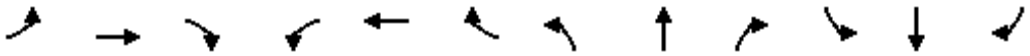
Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	60	2	24	125	2	190	12	1337	118	376	1716	48
Future Volume (veh/h)	60	2	24	125	2	190	12	1337	118	376	1716	48
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Ped-Bike Adj(A_pbT)	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1870	1870	1870	1900	1870	1900	1870	1885	1900	1707	1885	1870
Adj Flow Rate, veh/h	67	2	27	139	2	211	13	1486	131	418	1907	53
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Percent Heavy Veh, %	2	2	2	0	2	0	2	1	0	13	1	2
Cap, veh/h	234	15	198	275	249	843	179	1930	850	820	3388	1464
Arrive On Green	0.13	0.13	0.13	0.16	0.13	0.16	1.00	1.00	1.00	0.37	0.95	0.92
Sat Flow, veh/h	1168	110	1491	1403	1870	1610	224	3582	1610	1626	3582	1585
Grp Volume(v), veh/h	67	0	29	139	2	211	13	1486	131	418	1907	53
Grp Sat Flow(s),veh/h/ln	1168	0	1602	1403	1870	1610	224	1791	1610	1626	1791	1585
Q Serve(g_s), s	4.8	0.0	1.4	8.5	0.1	0.0	0.8	0.0	0.0	3.2	5.5	0.2
Cycle Q Clear(g_c), s	4.8	0.0	1.4	10.0	0.1	0.0	7.4	0.0	0.0	3.2	5.5	0.2
Prop In Lane	1.00		0.93	1.00		1.00	1.00		1.00	1.00		1.00
Lane Grp Cap(c), veh/h	234	0	213	275	249	843	179	1930	850	820	3388	1464
V/C Ratio(X)	0.29	0.00	0.14	0.50	0.01	0.25	0.07	0.77	0.15	0.51	0.56	0.04
Avail Cap(c_a), veh/h	234	0	213	276	249	843	179	1930	850	820	3388	1464
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	2.00	2.00	2.00	1.00	1.00	1.00
Upstream Filter(I)	1.00	0.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.09	0.09	0.09
Uniform Delay (d), s/veh	36.0	0.0	34.5	37.0	33.9	11.8	0.5	0.0	0.0	10.6	0.3	0.3
Incr Delay (d2), s/veh	0.7	0.0	0.3	1.5	0.0	0.2	0.8	3.0	0.4	0.0	0.1	0.0
Initial Q Delay(d3),s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(50%),veh/ln	1.4	0.0	0.6	3.0	0.0	2.3	0.0	0.8	0.1	5.0	0.0	0.0
Unsig. Movement Delay, s/veh												
LnGrp Delay(d),s/veh	36.6	0.0	34.7	38.5	33.9	11.9	1.3	3.0	0.4	10.7	0.3	0.3
LnGrp LOS	D	A	C	D	C	B	A	A	A	B	A	A
Approach Vol, veh/h		96			352			1630			2378	
Approach Delay, s/veh		36.1			22.5			2.8			2.2	
Approach LOS		D			C			A			A	

Timer - Assigned Phs		2		4	5	6		8				
Phs Duration (G+Y+Rc), s		89.1		17.5	37.1	52.0		17.5				
Change Period (Y+Rc), s		5.5		5.5	5.5	* 5.5		* 5.5				
Max Green Setting (Gmax), s		67.5		11.5	16.0	* 47		* 12				
Max Q Clear Time (g_c+I1), s		7.5		6.8	5.2	9.4		12.0				
Green Ext Time (p_c), s		16.8		0.1	1.3	11.0		0.0				

Intersection Summary												
HCM 6th Ctrl Delay			4.7									
HCM 6th LOS			A									

Notes

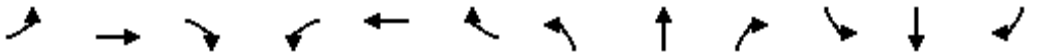
* HCM 6th computational engine requires equal clearance times for the phases crossing the barrier.



Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Group Flow (vph)	231	139	161	228	127	201	167	1292	238	230	1516	290
v/c Ratio	0.70	0.48	0.29	0.73	0.50	0.37	0.78	0.89	0.22	0.85	0.84	0.25
Control Delay	39.3	40.9	6.5	42.7	43.8	15.4	29.8	28.9	5.5	47.3	24.0	1.5
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	39.3	40.9	6.5	42.7	43.8	15.4	29.8	28.9	5.5	47.3	24.0	1.5
Queue Length 50th (ft)	106	73	4	104	68	46	35	375	34	106	280	2
Queue Length 95th (ft)	#184	131	49	#196	124	104	m#59	m#454	m46	m#194	361	26
Internal Link Dist (ft)		652			424			1210			503	
Turn Bay Length (ft)	150		150	100		100	100		150	250		250
Base Capacity (vph)	333	295	561	312	253	546	215	1459	1077	274	1808	1157
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.69	0.47	0.29	0.73	0.50	0.37	0.78	0.89	0.22	0.84	0.84	0.25

Intersection Summary

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.
m Volume for 95th percentile queue is metered by upstream signal.



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	208	125	145	205	114	181	150	1163	214	207	1364	261
Future Volume (veh/h)	208	125	145	205	114	181	150	1163	214	207	1364	261
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Ped-Bike Adj(A_pbT)	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1900	1900	1885	1900	1900	1870	1900	1737	1900	1841	1870	1841
Adj Flow Rate, veh/h	231	139	161	228	127	201	167	1292	238	230	1516	290
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Percent Heavy Veh, %	0	0	1	0	0	2	0	11	0	4	2	4
Cap, veh/h	354	296	391	334	253	397	317	1520	939	266	1816	1023
Arrive On Green	0.12	0.16	0.16	0.10	0.13	0.13	0.02	0.15	0.15	0.19	1.00	1.00
Sat Flow, veh/h	1810	1900	1598	1810	1900	1585	1810	3300	1610	1753	3554	1560
Grp Volume(v), veh/h	231	139	161	228	127	201	167	1292	238	230	1516	290
Grp Sat Flow(s),veh/h/ln	1810	1900	1598	1810	1900	1585	1810	1650	1610	1753	1777	1560
Q Serve(g_s), s	10.1	6.0	7.6	9.0	5.6	9.8	4.4	34.3	9.2	6.4	0.0	0.0
Cycle Q Clear(g_c), s	10.1	6.0	7.6	9.0	5.6	9.8	4.4	34.3	9.2	6.4	0.0	0.0
Prop In Lane	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Lane Grp Cap(c), veh/h	354	296	391	334	253	397	317	1520	939	266	1816	1023
V/C Ratio(X)	0.65	0.47	0.41	0.68	0.50	0.51	0.53	0.85	0.25	0.87	0.83	0.28
Avail Cap(c_a), veh/h	354	296	391	334	253	397	317	1520	939	294	1816	1023
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	0.33	0.33	0.33	2.00	2.00	2.00
Upstream Filter(I)	1.00	1.00	1.00	1.00	1.00	1.00	0.49	0.49	0.49	1.00	1.00	1.00
Uniform Delay (d), s/veh	30.5	34.6	28.6	32.7	36.2	29.0	12.7	35.1	15.3	17.6	0.0	0.0
Incr Delay (d2), s/veh	4.3	1.2	0.7	5.6	1.5	1.0	0.8	3.1	0.3	21.4	4.7	0.7
Initial Q Delay(d3),s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(50%),veh/ln	4.8	2.9	3.0	5.0	2.7	3.8	1.8	15.5	3.9	3.4	1.2	0.2
Unsig. Movement Delay, s/veh												
LnGrp Delay(d),s/veh	34.8	35.8	29.3	38.3	37.8	30.0	13.5	38.3	15.6	38.9	4.7	0.7
LnGrp LOS	C	D	C	D	D	C	B	D	B	D	A	A
Approach Vol, veh/h		531			556			1697			2036	
Approach Delay, s/veh		33.4			35.2			32.7			8.0	
Approach LOS		C			D			C			A	

Timer - Assigned Phs	1	2	3	4	5	6	7	8
Phs Duration (G+Y+Rc), s	9.0	49.5	16.0	15.5	13.5	45.0	14.0	17.5
Change Period (Y+Rc), s	3.0	5.5	5.0	5.5	5.0	5.5	5.0	5.5
Max Green Setting (Gmax), s	6.0	44.0	11.0	10.0	10.0	38.0	9.0	12.0
Max Q Clear Time (g_c+I1), s	6.4	2.0	12.1	11.8	8.4	36.3	11.0	9.6
Green Ext Time (p_c), s	0.0	12.4	0.0	0.0	0.1	1.2	0.0	0.3

Intersection Summary	
HCM 6th Ctrl Delay	22.6
HCM 6th LOS	C

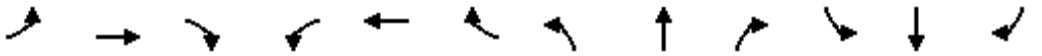
Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	SBL	SBT	SBR
Lane Group Flow (vph)	327	641	303	179	537	340	289	1152	400	1116	377
v/c Ratio	0.99	0.78	0.42	0.83	0.92	0.51	0.87	0.84	1.05	0.75	0.39
Control Delay	75.2	40.5	15.6	57.0	61.0	17.7	46.0	31.4	73.5	17.7	8.2
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	75.2	40.5	15.6	57.0	61.0	17.7	46.0	31.4	73.5	17.7	8.2
Queue Length 50th (ft)	150	181	87	74	160	99	104	301	~185	282	106
Queue Length 95th (ft)	#296	244	155	#151	#257	180	#241	390	m#299	401	m137
Internal Link Dist (ft)		704			836			3898		1210	
Turn Bay Length (ft)	200		150	100		150	325		300		300
Base Capacity (vph)	331	817	728	216	581	667	344	1370	382	1483	970
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.99	0.78	0.42	0.83	0.92	0.51	0.84	0.84	1.05	0.75	0.39

Intersection Summary

~ Volume exceeds capacity, queue is theoretically infinite.
Queue shown is maximum after two cycles.

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

m Volume for 95th percentile queue is metered by upstream signal.



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	294	577	273	161	483	306	260	905	131	360	1004	339
Future Volume (veh/h)	294	577	273	161	483	306	260	905	131	360	1004	339
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Ped-Bike Adj(A_pbT)	1.00		1.00	1.00		1.00	1.00		1.00	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870
Adj Flow Rate, veh/h	327	641	303	179	537	340	289	1006	146	400	1116	377
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Percent Heavy Veh, %	2	2	2	2	2	2	2	2	2	2	2	2
Cap, veh/h	318	821	597	222	584	525	353	1218	177	415	1545	865
Arrive On Green	0.13	0.23	0.23	0.07	0.16	0.15	0.12	0.39	0.38	0.17	0.43	0.41
Sat Flow, veh/h	1781	3554	1585	1781	3554	1585	1781	3114	452	1781	3554	1585
Grp Volume(v), veh/h	327	641	303	179	537	340	289	574	578	400	1116	377
Grp Sat Flow(s),veh/h/ln	1781	1777	1585	1781	1777	1585	1781	1777	1789	1781	1777	1585
Q Serve(g_s), s	12.0	15.2	13.3	6.0	13.4	13.8	8.9	26.1	26.2	14.0	23.3	12.8
Cycle Q Clear(g_c), s	12.0	15.2	13.3	6.0	13.4	13.8	8.9	26.1	26.2	14.0	23.3	12.8
Prop In Lane	1.00		1.00	1.00		1.00	1.00		0.25	1.00		1.00
Lane Grp Cap(c), veh/h	318	821	597	222	584	525	353	695	700	415	1545	865
V/C Ratio(X)	1.03	0.78	0.51	0.81	0.92	0.65	0.82	0.83	0.83	0.96	0.72	0.44
Avail Cap(c_a), veh/h	318	821	597	222	584	525	391	695	700	415	1545	865
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Upstream Filter(I)	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	0.53	0.53	0.53
Uniform Delay (d), s/veh	29.4	32.5	21.6	34.3	37.0	25.6	18.7	24.6	24.8	23.0	21.0	12.2
Incr Delay (d2), s/veh	58.4	4.9	0.7	19.1	19.8	2.8	11.8	10.8	10.8	23.7	1.6	0.8
Initial Q Delay(d3),s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(50%),veh/ln	10.7	6.8	4.8	2.1	7.2	6.3	4.3	11.9	12.1	7.8	8.9	4.3
Unsig. Movement Delay, s/veh												
LnGrp Delay(d),s/veh	87.9	37.3	22.3	53.4	56.8	28.4	30.5	35.4	35.6	46.7	22.6	13.0
LnGrp LOS	F	D	C	D	E	C	C	D	D	D	C	B
Approach Vol, veh/h		1271			1056			1441			1893	
Approach Delay, s/veh		46.8			47.1			34.5			25.8	
Approach LOS		D			D			C			C	

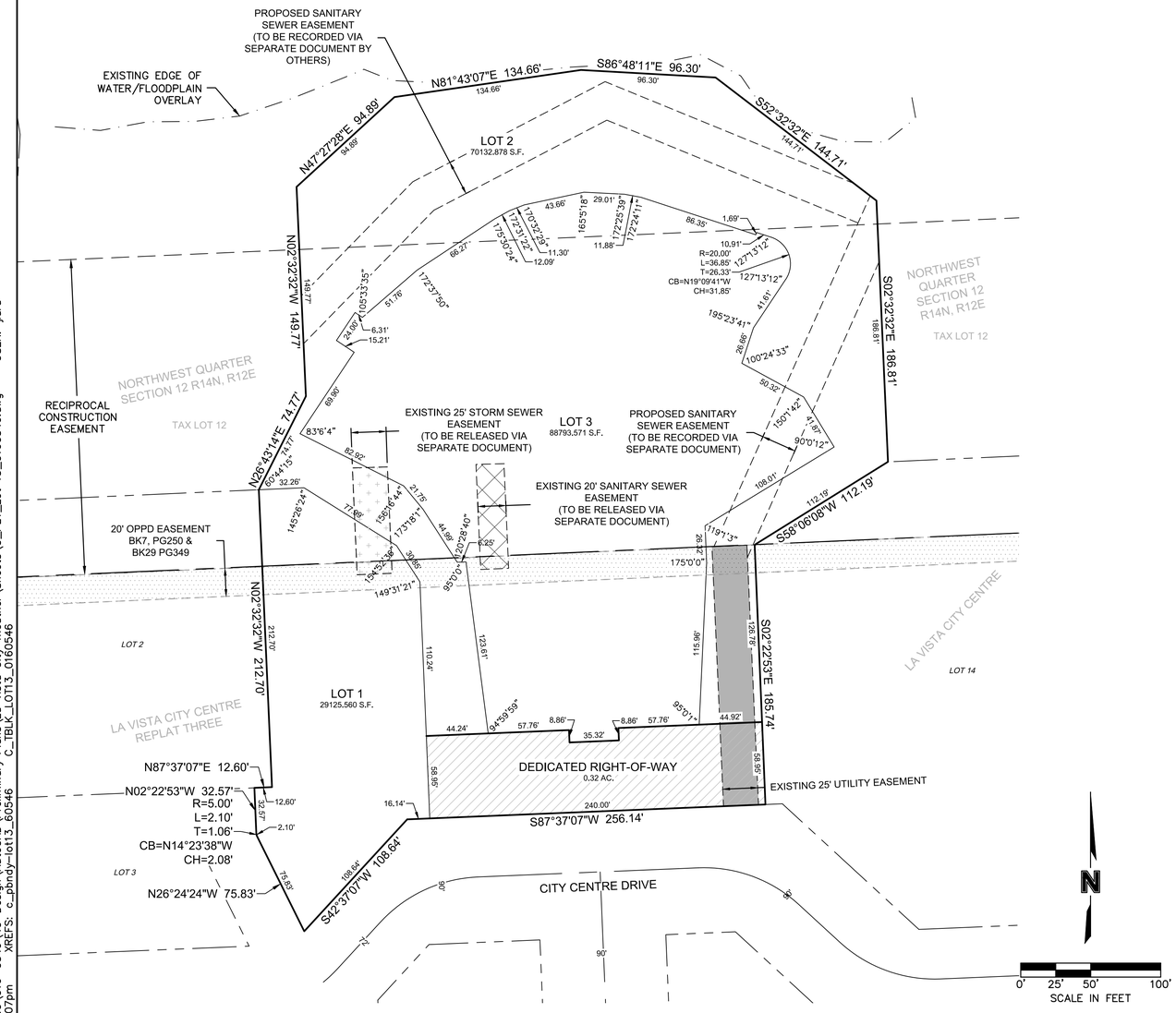
Timer - Assigned Phs	1	2	3	4	5	6	7	8
Phs Duration (G+Y+Rc), s	14.1	42.6	9.0	24.3	18.0	38.7	15.0	18.3
Change Period (Y+Rc), s	3.0	5.5	3.0	5.5	3.0	5.5	3.0	5.5
Max Green Setting (Gmax), s	13.0	35.2	6.0	18.8	15.0	33.2	12.0	12.8
Max Q Clear Time (g_c+I1), s	10.9	25.3	8.0	17.2	16.0	28.2	14.0	15.8
Green Ext Time (p_c), s	0.2	5.1	0.0	0.8	0.0	2.3	0.0	0.0

Intersection Summary	
HCM 6th Ctrl Delay	36.7
HCM 6th LOS	D

LA VISTA CITY CENTRE THEATER

LOTS 1 THRU 3

A REPLAT OF LOTS 13 AND OUTLOT A, LA VISTA CITY CENTRE, AND LOT 1, LA VISTA CITY CENTRE REPLAT THREE, SUBDIVISIONS, SURVEYED, PLATTED AND RECORDED IN THE SOUTHWEST QUARTER AND NORTHWEST QUARTER, TOGETHER WITH A PART OF TAX LOT 12 IN THE NORTHWEST QUARTER, ALL IN SECTION 14, TOWNSHIP 14 NORTH, RANGE 12 EAST OF THE 6TH P.M., CITY OF LA VISTA, SARPY COUNTY, NEBRASKA.



SHEET INDEX	
C1.1	PRELIMINARY PLAT
C3.1	PRELIMINARY SITE AND UTILITY PLAN
C3.2	PRELIMINARY GRADING, DRAINAGE, & SWPPP

EXISTING ZONING		
	ZONING	DESC.
LOTS 1 THRU 3	MU-R1	MIXED USE / RESIDENTIAL

PROPOSED ZONING		
	ZONING	DESC.
LOTS 1 THRU 3	MU-CC	MIXED USE / CITY CENTRE

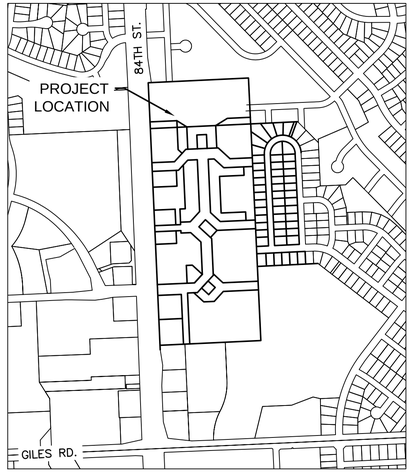
LEGEND

- SECTION LINE
- BOUNDARY LINE
- PROPERTY LINE
- EXISTING PROPERTY LINE
- PROPOSED EASEMENT LINE
- EXISTING UTILITY EASEMENT
- DEDICATED RIGHT-OF-WAY

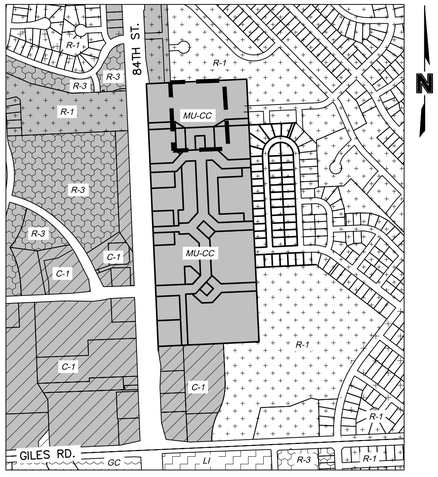
NOTE:

1. ALL INTERNAL ANGLES ARE 90° UNLESS OTHERWISE NOTED.
2. REFERENCE EXISTING CONDITIONS PLAN FOR EASEMENT DETAILS.
3. SUBJECT PROPERTY CONTAINS A CALCULATED AREA OF 4.17 ACRES MORE OR LESS.

C–1 = SHOPPING CENTER DISTRICT
CC = COMMUNITY COMMERCIAL DISTRICT
MU = MIXED USED DISTRICT
R–1 = SINGLE–FAMILY RESIDENTIAL DISTRICT
R–2 = TWO–FAMILY RESIDENTIAL DISTRICT
GC = GENERAL COMMERCIAL
LI = LIGHT INDUSTRIAL DISTRICT
GWAY = GATEWAY CORRIDOR OVERLAY DISTRICT



VICINITY MAP
NOT TO SCALE



EXISTING ZONING MAP
NOT TO SCALE

DEVELOPER
CHRISTOPHER ERICKSON
LA VISTA CITY CENTRE, LLC
222 S. 15TH SUITE 14245
OMAHA, NE 68102

SURVEYOR
TERRY ROTHANZL
OLSSON
2111 S. 67TH STREET, SUITE 200
OMAHA, NE 68106

ENGINEER
ERIC GALLEY
OLSSON
2111 S. 67TH STREET, SUITE 200
OMAHA, NE 68106

SURVEY CERTIFICATION

TERRY ROTHANZL, L.S.

CITY OF LA VISTA PLAT APPROVAL

olsson
2111 South 67th Street, Suite 200
Omaha, NE 68106
TEL 402.341.1116
www.olsson.com

REV. NO.	DATE	REVISIONS DESCRIPTION
		REVISIONS

PRELIMINARY PLAT

LA VISTA CITY CENTRE THEATER
LOTS 1 THRU 3

2019

LA VISTA, NEBRASKA

drawn by:	JLC
checked by:	EW
approved by:	ERG
QA/QC by:	ERG
project no.:	016-0546
drawing no.:	
date:	06.13.19

SHEET
C1.1

DWG: F:\2016\0501-1000\016-0546\40-Design\AutoCAD\Preliminary Plans\La Vista City Theather\Sheets\C_PLT_Lot 13_0160546.dwg
DATE: Jun 13, 2019 4:07pm XREFS: c_pbndy-lot13_60546 C_TBLK_LOT13_0160546 USER: jlara

*UTILITY SIZES AREA APPROXIMATE AND WILL NEED TO BE COORDINATED WITH THE MEP PRIOR TO FINALIZING PLANS.

EXISTING EDGE OF WATER/FLOODPLAIN OVERLAY

N81°43'07"E 134.66'
134.66'

S86°48'11"E 96.30'
96.30'

N47°27'28"E 94.89'
94.89'

S52°32'32"E 144.71'
144.71'

LOT 2
70132.878 S.F.

43.66'
29.01'
86.35'
1.69'
10.91'
11.30'
12.09'
11.88'
R=20.00'
L=36.85'
T=26.33'
CB=N19°09'41"W
CH=31.85'
66.27'
51.76'
24.00'
6.31'
15.21'
41.61'

N02°32'32"W 149.77'
149.77'

S02°32'32"E 186.81'
186.81'

NORTHWEST QUARTER SECTION 12 R14N, R12E

TAX LOT 12

NORTHWEST QUARTER SECTION 12 R14N, R12E

TAX LOT 12

LOT 3
88793.571 S.F.

LOWER/STAGE
FFE: 1105.33'

UPPER
FFE: 1124.00'

N26°43'14"E 74.77'
74.77'

62.92'
32.26'
21.75'
77.90'
44.99'
30.95'
6.25'
108.01'
112.19'
S58°06'08"W 112.19'
26.80'
50.32'
41.79'

N02°32'32"W 212.70'
212.70'

LOT 2

LOT 1
29125.560 S.F.

LA VISTA CITY CENTRE REPLAT THREE

110.24'
126.78'
S02°22'53"E 185.74'
44.93'
58.95'
58.95'

RECREATION/RETAIL
FFE: 1119.00'

LA VISTA CITY CENTRE
LOT 14

GARAGE
FFE: 1121.00'

8.86'
35.32'
8.86'
44.24'
57.76'
57.76'

DEDICATED RIGHT-OF-WAY
0.32 AC.

COM GAS

EXISTING 25' UTILITY EASEMENT

N87°37'07"E 12.60'
N02°22'53"W 32.57'
12.60'
32.57'
R=5.00'
L=2.10'
T=1.06'
CB=N14°23'38"W
CH=2.08'
2.10'
16.14'
240.00'
S87°37'07"W 256.14'

LOT 3

N26°24'24"W 75.83'
75.83'
108.64'
S42°37'07"W 108.64'

RETAIL
FFE: 1124.00'

CITY CENTRE DRIVE

72'
90'
90'
90'

LEGEND

	BOUNDARY LINE
	SECTION LINE
	EXISTING PROPERTY LINE
SS	EXISTING SANITARY SEWER
P–OH	EXISTING OVERHEAD POWER
G	EXISTING GAS LINE
	EXISTING STORM SEWER
W	EXISTING WATER LINE
	PROPOSED SANITARY SEWER
W	PROPOSED WATER LINE

NOTES:

1. WATER PROVIDED BY M.U.D. GAS TO BE PROVIDED BY BLACK HILLS ENERGY.
2. POWER TO BE PROVIDED BY O.P.P.D.
3. TELEPHONE AND CABLE TO BE PROVIDED BY LOCAL SERVICE.
4. THE CALCULATION OF THE AREA REQUIRING CONTROL OF THE FIRST ONE HALF INCH OF RUNOFF SHALL BE BASED ONLY ON THE IMPERVIOUS AREA OF THE PROJECT BEING ADDED OR REPLACED.
5. THE FINAL POST CONSTRUCTION STORMWATER MANAGEMENT PLAN SHALL BE SUBMITTED FOR APPROVAL AT THE TIME OF BUILDING PERMIT.
6. ALL DIMENSIONS ARE TO BACK OF CURB, UNLESS OTHERWISE NOTED.

N

0' 15' 30' 60'
SCALE IN FEET

olsson
2111 South 67th Street, Suite 200
Omaha, NE 68106
TEL 402.341.1116
www.olsson.com

REV. NO.	DATE	REVISIONS DESCRIPTION
		REVISIONS

PRELIMINARY SITE AND UTILITY PLAN

LA VISTA CITY CENTRE THEATER
LOTS 1 THRU 3

2019

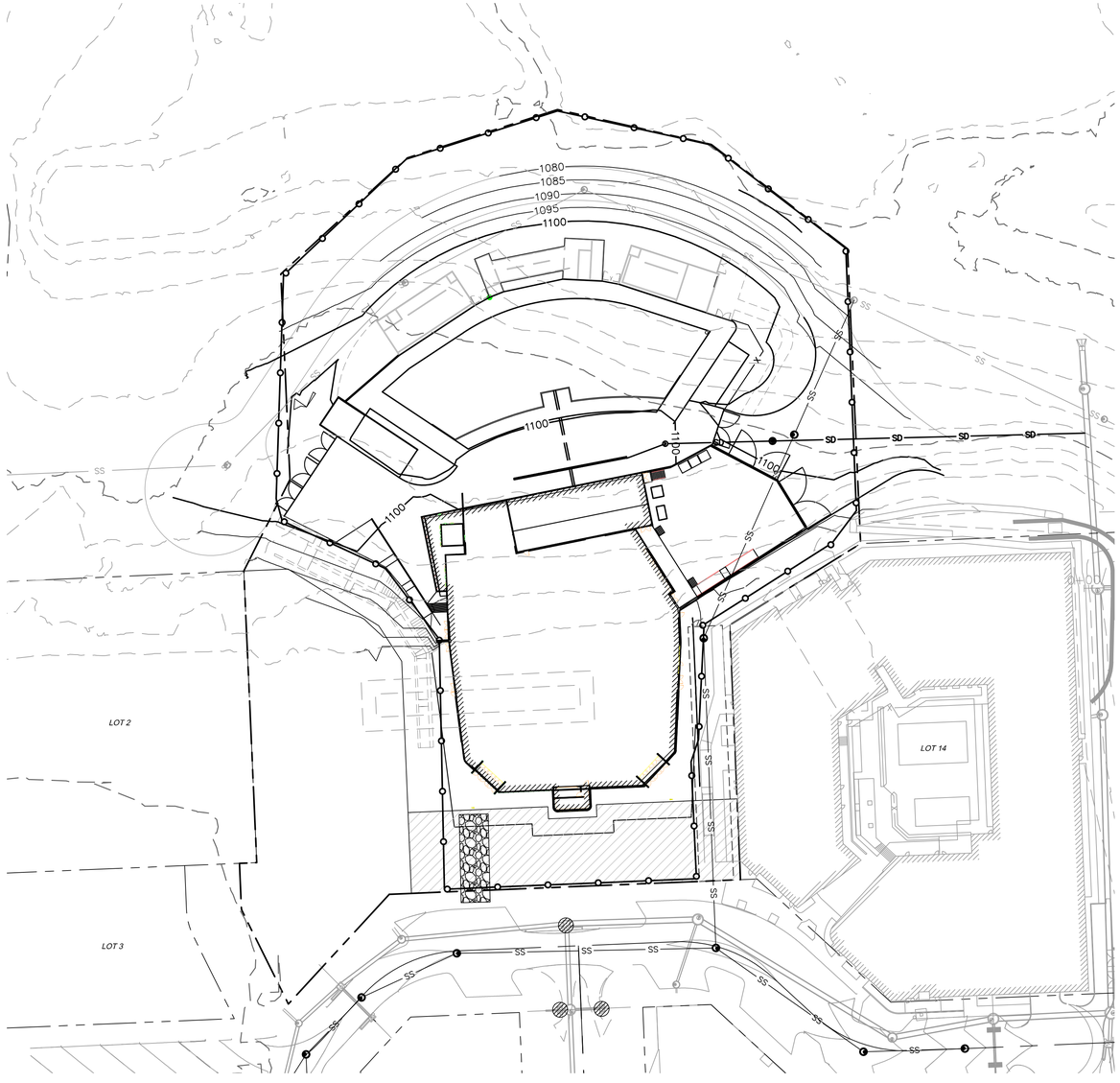
LA VISTA, NEBRASKA

drawn by:	EW
checked by:	EW
approved by:	KH
QA/QC by:	KH
project no.:	016-0546
drawing no.:	
date:	06.13.19

SHEET
C2.1

DWG: F:\2016\0501-1000\016-0546\40-Design\AutoCAD\Preliminary Plans\La Vista City Theather\Sheets\C_UTL_Lot 13_0160546.dwg
DATE: Jun 13, 2019 4:09pm
USER: jlora

PCSMP: 20170324-3736P



LEGEND

- BOUNDARY LINE
- SECTION LINE
- EXISTING PROPERTY LINE
- SILT FENCE
- CONSTRUCTION ENTRANCE
- INLET PROTECTION
- EXISTING MAJOR CONTOUR
- EXISTING MINOR CONTOUR
- PROPOSED MAJOR CONTOUR
- PROPOSED MINOR CONTOUR
- PROPOSED STORM SEWER INLET/MANHOLE

NOTES:

1. CONTOURS SHOWN ARE AT 5' INTERVALS.
2. IT IS THE DEVELOPER'S INTENT TO DO ALL GRADING AND EROSION CONTROL UNDER ONE PERMIT.
3. THE OVERALL DISTURBED AREA WILL EXCEED FIVE ACRES AND ADD NOTATIONS THAT SEDIMENT TRAPS/BASINS, SILT FENCES, AND INLET FILTERS WILL BE UTILIZED FOR SEDIMENT CONTROL AT A MINIMUM. DEPENDENT ON WHICH ENTITY UNDERTAKES THE SITE PREPARATION GRADING FOR THESE LOTS WILL IDENTIFY WHICH EROSION CONTROL PERMIT NEEDS TO BE MODIFIED IN PERMIX TO INCLUDE THIS AREA.

Revised Acreage Draining to Basins: 1.01 acres

Required Water Quality Treatment Volume: (Drainage Area) * 1,815 CF/AC
(1.01 AC) * 1,815 CF/AC = 1,833 CF

Water Quality Treatment Volume to be Provided: 1,833 CF

N

0' 25' 50' 100'
SCALE IN FEET

olsson
2111 South 67th Street, Suite 200
Omaha, NE 68106
TEL 402.341.1116
www.olsson.com

REVISIONS

REV. NO.	DATE	REVISIONS DESCRIPTION

PRELIMINARY SITE AND UTILITY PLAN

LA VISTA CITY CENTRE THEATER
LOTS 1 THRU 3

LA VISTA, NEBRASKA

2019

drawn by: EW
checked by: EW
approved by: KH
QA/QC by: KH
project no.: 016-0546
drawing no.:
date: 06.13.19

SHEET
C3.1

DWG: F:\2016\0501-1000\016-0546\40-Design\AutoCAD\Preliminary Plans\La Vista City Theather\Sheets\C_GRD_Lot 13_0160546.dwg USER: ewilliams
DATE: Jun 13, 2019 4:14pm