Kimley»Horn

MEMORANDUM

To: Mr. Samir Mayekar
Deputy Mayor
Economic and Neighborhood Development
City of Chicago

From: Peter Lemmon, P.E., PTOE

Date: May 19, 2022

RE: Temporary Casino Option Transportation Review
Medinah Temple
600 N Wabash Avenue
Chicago, Illinois

INTRODUCTION

Kimley-Horn and Associates, Inc. (Kimley-Horn) is assisting the City of Chicago with technical review of alternative applications to develop and operate a casino within the city. More specifically, Kimley-Horn's review focuses on transportation engineering elements of each application. In total, five applications were submitted – four of which included proposals for temporary locations that could operate in the near term while the permanent casino would be constructed. As an alternative to the temporary locations proposed by the applicants as part of their initial submittal, the city has identified additional temporary potential sites in the downtown Chicago area for consideration. One such location is Medinah Temple, located at 600 N. Wabash Avenue – the west side of Wabash Avenue between Ohio Street and Ontario Street.

This memorandum summarizes an initial transportation review of the Medinah Temple site as a temporary casino location, documents a qualitative review of the plan's transportation characteristics relative to the observed transportation conditions on the surrounding street system, and outlines key considerations from a transportation perspective for the site's use as a temporary casino location, regardless of the successfully chosen applicant.

EXISTING CONDITIONS

Key characteristics associated with the Medinah Temple site are outlined below.

Site Location and Characteristics

Medinah Temple is located on the west side of Wabash Avenue between Ontario Street on the north and Ohio Street on the south. The western portion of the block is largely comprised of the Tree Studios and multiple ground-floor commercial uses along Ohio Street, State Street, and Ontario Street. Building access for Medinah Temple is primarily maintained on Wabash Avenue, Ohio Street, and to a lesser degree along Ontario Street. The Ivy Room, a six-level events venue immediately adjacent to Medinah Temple with internal connections, provides a separate access on Ohio Street.

Street Network

Medinah Temple is primarily served by Ohio Street (south), Ontario Street (north), and Wabash Avenue (east), which are briefly detailed below.

Ohio Street is a one-way eastbound arterial street with three travel lanes plus curbside lanes on both sides (53 feet wide). In the site vicinity, the south side of Ohio Street includes a mix of No Parking, 15-minute Standing Zones, and a CTA bus stop. On the north side of the street, parking is prohibited within a curb lane adjacent to Medinah Temple.

Ontario Street is a one-way westbound arterial with four travel lanes. In the immediate site vicinity, parking is prohibited on the north side of the street while the curb lane on the south side of the street provides metered on-street parking east (approximately 4 spaces) and west (approximately 6 spaces) of the Medinah Temple loading dock.

Wabash Avenue is a two-way street along the east side of the site with one lane in each direction along with adjacent curb lanes. Adjacent to the site, the southbound curb lane restricts parking, but provides width for curbside activity without impacting southbound traffic flow. The east side of the street across from the site includes a mix of No Parking and Loading Zone areas to serve adjacent restaurant activity. The intersections along Wabash Avenue at both Ohio Street and Ontario Street are controlled with traffic signals.

Traffic Counts

Traffic volumes quantifying current levels of auto and pedestrian activity at the intersections defining the block of the subject site were collected by Kimley-Horn on Thursday, May 12 and Friday, May 13, 2022 from 5:00 PM to 9:00 PM each day. These days and count periods include a typical weekday evening peak hour (Thursday at 5:00-6:00 PM) and a casino evening peak hour (Friday at 8:00-9:00 PM). Intersection traffic and pedestrian counts were collected at the following intersections:

- Ohio Street / State Street
- Ohio Street / Wabash Avenue
- Ontario Street / State Street
- Ohio Street / Wabash Avenue

Traffic and pedestrian counts during the Weekday PM peak hour and Friday Casino PM peak hour are illustrated in **Exhibit 1.**

Parking

Off-street parking is available at several garages on the surrounding blocks. **Exhibit 1** illustrates off-street parking options in the immediate area, collectively providing over 4,100 spaces for public parking within 1-2 blocks of Medinah Temple.

Public Transportation

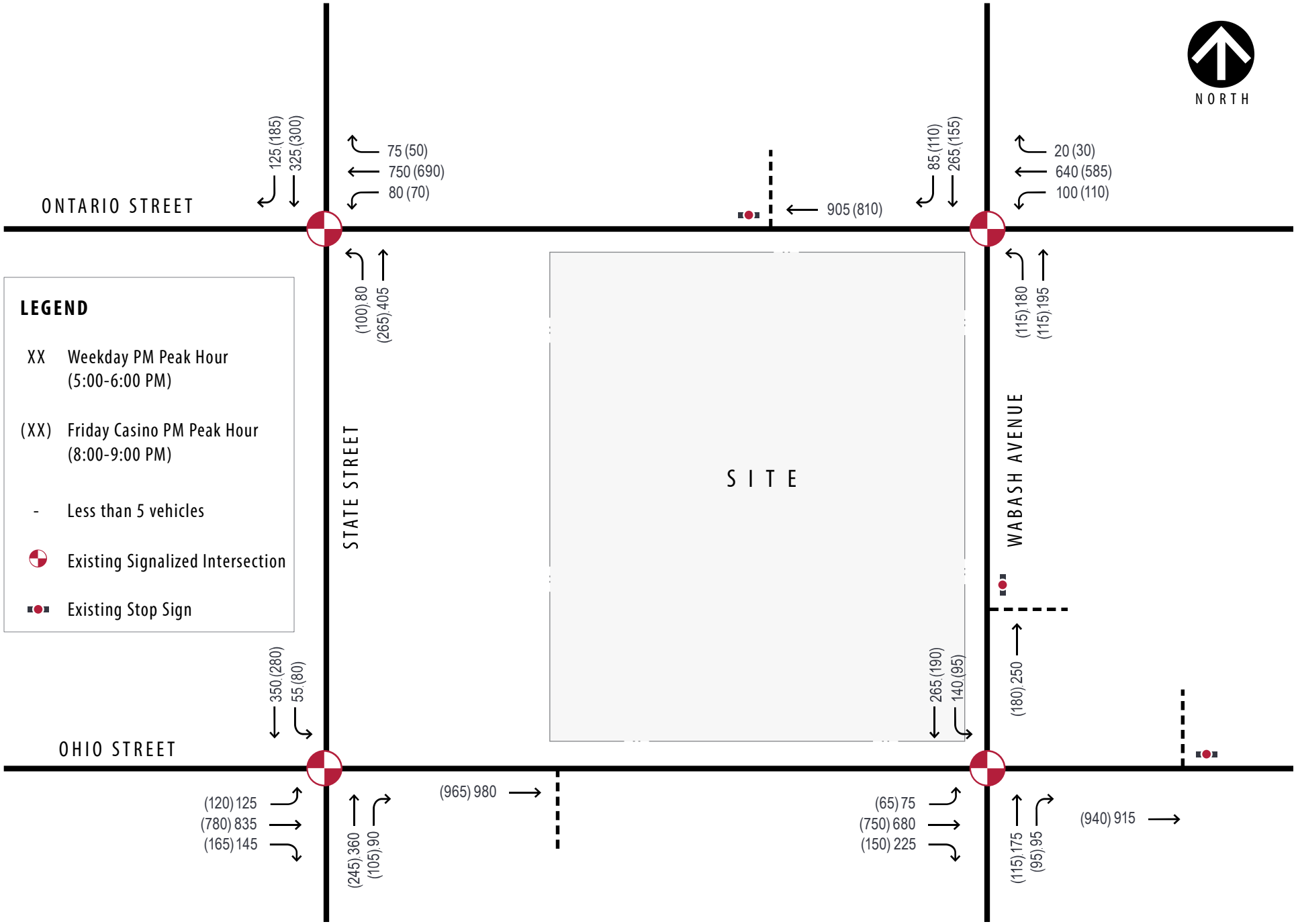
CTA Rail

The Chicago Transit Authority (CTA) maintains the Grand Avenue Red Line station approximately one block west and one block south of Medinah Temple at the State Street/Grand Avenue intersection.

CTA Bus

Multiple CTA bus routes operate within a few blocks of Medinah Temple, including:

- Route 36 — Service along State Street west of the site
- Route 22 — Service along Clark and Dearborn Streets west of the site
- Route 156 — Service along LaSalle Street west of the site
- Routes 29 and 65 — Service along Grand Avenue and Illinois Street south of the site
- Routes 2, 3, 143, 147, 148, 151, and 157 — Service along Michigan Avenue east of the site
- Route 66 — Service along Chicago Avenue north of the site
- Route 125 — Service along Ohio and Ontario Streets bordering the site

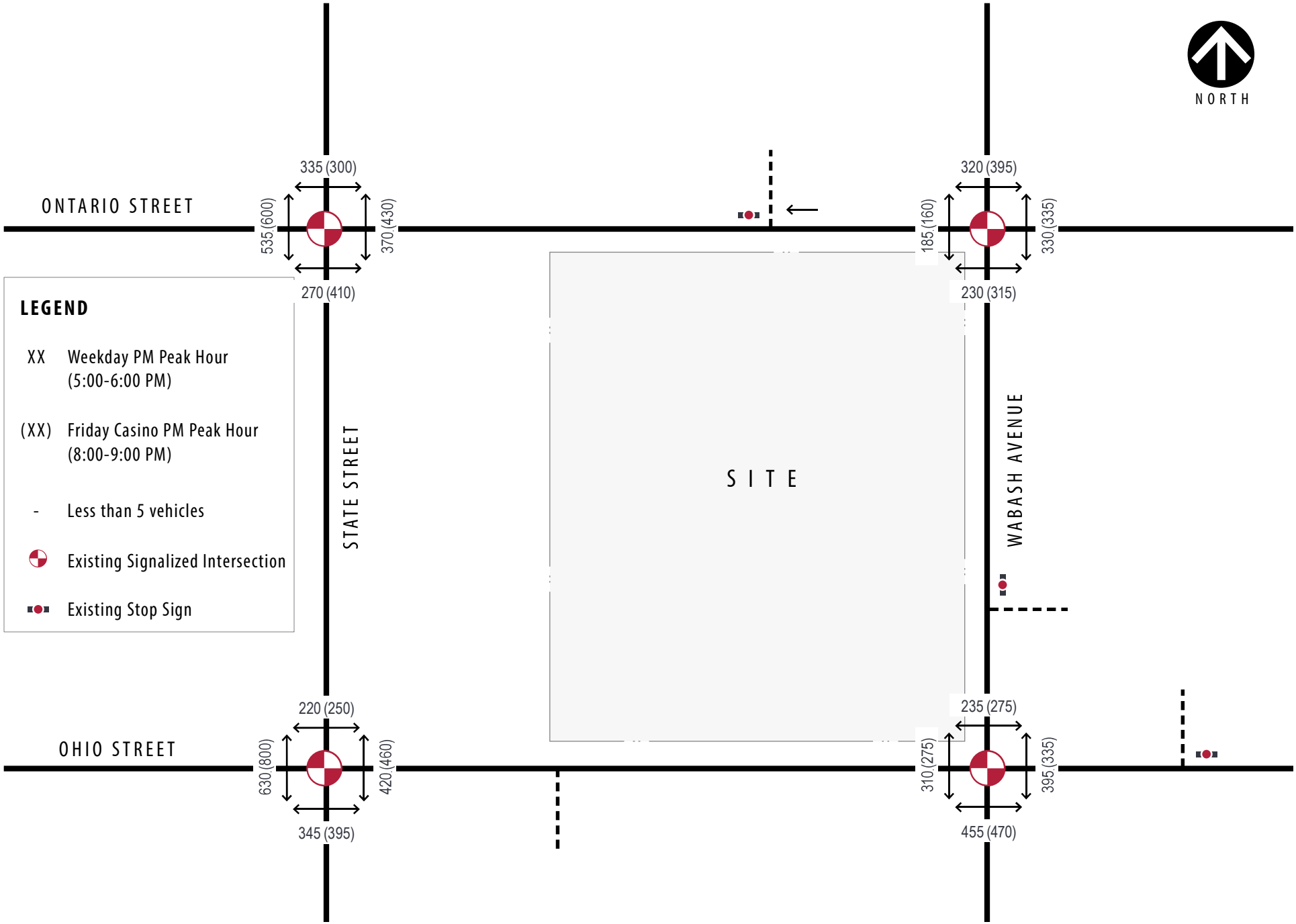


Kimley»Horn

EXHIBIT 1

TEMPORARY CASINO LOCATION REVIEW

EXISTING TRAFFIC VOLUMES



Kimley»Horn

EXHIBIT 2

TEMPORARY CASINO LOCATION REVIEW

EXISTING PEDESTRIAN VOLUMES

LEGEND

Medinah Temple (Temporary Site)

Nearby Parking Garage

CTA Rail Station (Grand/Red Line)

A 10 E Ontario
Capacity: 496 spaces [1]
Managed By: InterPark

B 630 N. Rush Street
Capacity: unknown
Managed By: 180 spaces [1]
** Primarily serves AC Hotel and Trader Joe's*

C 50 E Ohio
Capacity: 1,025 spaces [2]
Managed By: InterPark

D 11 E Ohio / 10 E Grand
Capacity: 970 spaces [2]
Managed By: InterPark

E Grand Plaza / 10 W Grand
Capacity: 1,100 spaces [1]
Managed By: LAZ Parking

F 33 W Ontario (Self Park Ohio-Ontario)
Capacity: 356 spaces [2]
Managed By: ABM

1 Parking capacity as published on parkopedia.com
2 Parking capacity as provided by Friedman Properties

EXHIBIT 3
TEMPORARY CASINO LOCATION REVIEW
NEARBY PARKING LOCATIONS | MEDINAH TEMPLE

TEMPORARY CASINO CHARACTERISTICS

As part of introducing a new casino in the City of Chicago, a temporary casino will be established and operational in the near term until the permanent facility is constructed and open. The Medinah Temple site is being contemplated as a potential temporary casino location, exclusive of a selected applicant. This section outlines traffic-related characteristics of the temporary casino plan.

Casino Description

The program for the temporary casino is smaller and includes fewer components (e.g., no theater, no hotel, reduced food and beverage offerings) relative to the permanent venue will have. While the temporary casino program is not fully defined, for purposes of this evaluation, it is assumed to consist of up to approximately 800 total gaming positions.

Access and Parking

Parking is not available on site; however, several public self-park options are available on adjacent blocks with a combined capacity of over 4,100 spaces.

In terms of building access, the two primary entry/exit points are located on Ohio Street and Wabash Avenue. Casino patrons arriving curbside, whether using taxis and TNCs (Transportation Network Companies) like Uber and Lyft, could use loading zones along the north side of Ohio Street or the west side of Wabash Avenue.

Charter and shuttle buses that arrive with groups would be best oriented to the use the west side of Wabash Avenue to load/unload passengers as the bus door would be on the curb side of the vehicle. Buses would not be allowed to stage curbside at the site or in the surrounding area. Rather, buses would be directed to park at designated bus parking zones near the downtown area before returning to pick up passengers. City-designated charter bus parking areas include Kinzie Street (between Des Plaines Street and Union Avenue), Canal Street (east side south of Roosevelt Road), and Green Street (east side between Kinzie Street and Carroll Avenue).

Medinah Temple is located in River North, a highly walkable neighborhood near many hotels, restaurants, and other destinations in the downtown area, suggesting that the site is conveniently accessible by foot. While casino patrons are expected to primarily use a car to access the site or walk from nearby hotels and restaurants, Medinah Temple is located one block north and east of the CTA's Red Line Grand Avenue station which is convenient for casino patrons and employees. Several CTA bus routes also run within 1-2 blocks of the site.

Trip Generation

Traffic projections associated with casinos can vary based on various factors including type, location, typical patron base, and accompanying development components among other factors. For purposes of this evaluation, projections are based on trip rates consistent with those applied to the Rivers 78 and Rivers McCormick applications, which are derived from empirical data experienced at Rivers Des Plaines with a 15 percent non-auto mode share reduction. Related to curbside use of valet and drop-off/pick-up activity with taxis and TNCs, assumptions are made based on Kimley-Horn's experience with casino porte cocheres and estimations reflecting the downtown Chicago

market. **Table 1** presents the curbside and self-park assumptions and **Table 2** summarizes the projected peak hour trip generation estimate for the weekday AM, weekday PM, and casino peak period on a Friday evening.

Table 1. Casino Curbside Assumptions (Temporary Venue)

Description		Share
Guests	Portion of traffic using curbside	45%
	Taxi / TNC	*30%*
	Valet	*10%*
	Limo / Third Party Bus	*5%*
	Self-Park	45%
Employees	Self-Park	10%
Total		100%

Table 2. Trip Generation Estimate (Temporary Venue)

Land Use	Unit	Weekday AM Peak Hr			Weekday PM Peak Hr			Friday PM Casino Peak Hr		
		In	Out	Total	In	Out	Total	In	Out	Total
Casino	800 gaming positions	35	15	50	165	155	320	185	170	355
Non-Auto Mode Share[1]	-15%	-5	-5	-10	-25	-25	-50	-30	-25	-55
Subtotal ADJUSTED FOR TRANSIT/WALK		30	10	40	140	130	270	155	145	300
Personal Auto Trips	70%	20	5	25	100	90	190	110	100	210
Enter-Oriented Trips	30%	*10*	*+10*	*20*	*40*	*+40*	*80*	*45*	*+45*	*90*
Exit-Oriented Trips		*+5*	*5*	*10*	*+40*	*40*	*80*	*+45*	*45*	*90*
Taxi / TNC Trips[2]		15	15	30	80	80	160	90	90	180
Total New Auto Trips		35	20	55	180	170	350	200	190	390

1 Based on trip rate consistent with empirical data Rivers Des Plaines for the Rivers 78 and Rivers McCormick applications

2 Taxi/TNC trips are estimated based on the taxi mode share (30%) as a portion of the vehicular mode share. Taxi/TNC trips are doubled to reflect both the arrival and departure trips associated with a passenger pick-up and drop-off conservatively assuming that all such trips are not combined (i.e., taxis that drop off a fare do not also pick up a fare at the same time)

To provide some context for development uses that would be expected to generate similar levels of traffic, particularly during the typical weekday evening peak hour, Kimley-Horn prepared trip generation projections for theoretical alternative land use/density scenarios, referencing the Institute of Transportation Engineer's (ITE's) manual titled *Trip Generation, 11th Edition*, with typical assumptions for non-auto mode share similar to the approach use for most traffic studies in Chicago. Two theoretical scenarios are outlined in **Table 3**.

One scenario considers a medical office occupying the same floor area available at Medinah Temple (approximately 135,000 square feet). With approximately one-third of trips using walk/bike/transit

modes, the PM peak hour trip generation would be similar to a temporary casino. The AM peak hour would experience more trips at a medical office, but less traffic during the evening casino peak hour.

A second scenario considers what size office building would generally generate a similar volume of weekday PM peak hour trips as the temporary casino while applying a typical non-auto mode share for office buildings in downtown Chicago (approximately 80 percent). Due to the high use of walk/transit/bike modes for commuters downtown, an approximately 1.2 million-square-foot office building would be expected to generate a similar volume of traffic during the evening peak hour along with more considerably traffic during the morning and less traffic during the evening casino peak hours.

Table 3. Trip Generation Estimates (Theoretical Development Scenarios with Similar Trip Projections to Temporary Casino Venue)

Land Use	Unit	Weekday AM Peak Hr			Weekday PM Peak Hr		
		In	Out	Total	In	Out	Total
Scenario 1							
Medical Office	135,000 sf	330	90	420	160	370	530
Non-Auto Mode Share[1]	-34%	-110	-30	-140	-55	-125	-180
Subtotal MEDICAL OFFICE		220	60	280	105	245	350
Scenario 2							
Office	1,200,000 sf	1,805	245	2,050	330	1,615	1,945
Non-Auto Mode Share[1]	-80%	-1,445	-195	-1,640	-265	-1,290	-1,555
Subtotal OFFICE		360	50	410	65	325	390

Directional Distribution

The estimated distribution of site-generated traffic on the surrounding roadway network and through adjacent intersections as it approaches and departs the site is a function of several variables, such as parking locations and site access, curbside loading zones, characteristics of the street system, and anticipated access routes. For a temporary casino, directional distribution is assumed to be generally consistent with distributions presented in Applicant traffic studies with consideration for major access routes to/from I-90/94, DuSable Lake Shore Drive, and concentrations of nearby hotels and restaurants. As such, the assumed directional distribution for those driving and parking and those dropped off/picked up curbside using taxi/TNC for the temporary casino site is summarized in **Table 4**.

Table 4. Estimated Trip Distribution

To/From	Portion of Site Traffic			
	To / From Parking		To / From Curb (Taxi+TNC)	
	Arrive	Depart	Arrive	Depart
West on Ohio Street	70%	-	40%	-
West on Ontario Street	-	40%	-	20%
East on Ohio Street	-	-	-	20%
East on Ontario Street	25%	-	20%	-
North on State Street	-	-	20%	-
South on State Street	5%	20%	20%	-
North on Wabash Avenue	-	-	-	20%
South on Wabash Avenue	-	-	-	20%
West on Grand Avenue	-	40%	-	20%
Total	100%	100%	100%	100%

Site Traffic Assignment

Assignment of projected traffic across the street network and study intersections is a function of the trip generation estimates for personal auto trips and taxi/TNC trips (Table 2) factored by the directional distribution (Table 4). For the temporary casino, separate site traffic assignments for trips to/from parking and to/from curbside loading zones along Ohio Street and Wabash Avenue are presented in **Exhibit 4** and **Exhibit 5**, respectively. For traffic to/from parking, the traffic was assigned to adjacent parking garages at 10 E. Ontario Street (just north of the site), 50 E Ohio Street (just east of the site), and 11 E. Ohio Street/10 E. Grand Avenue (just south of the site). Other parking options are available nearby; however, assigning traffic to these locations generally includes routing all traffic through the adjacent intersections. In the case of the garage at 11 E. Ohio Street/11 E. Grand Avenue, exit driveways are not located on Ohio Street and thus traffic exiting to the west (Grand Avenue) and south State Street) are assumed to use access driveways not shown in the exhibits.

Total Traffic Assignment

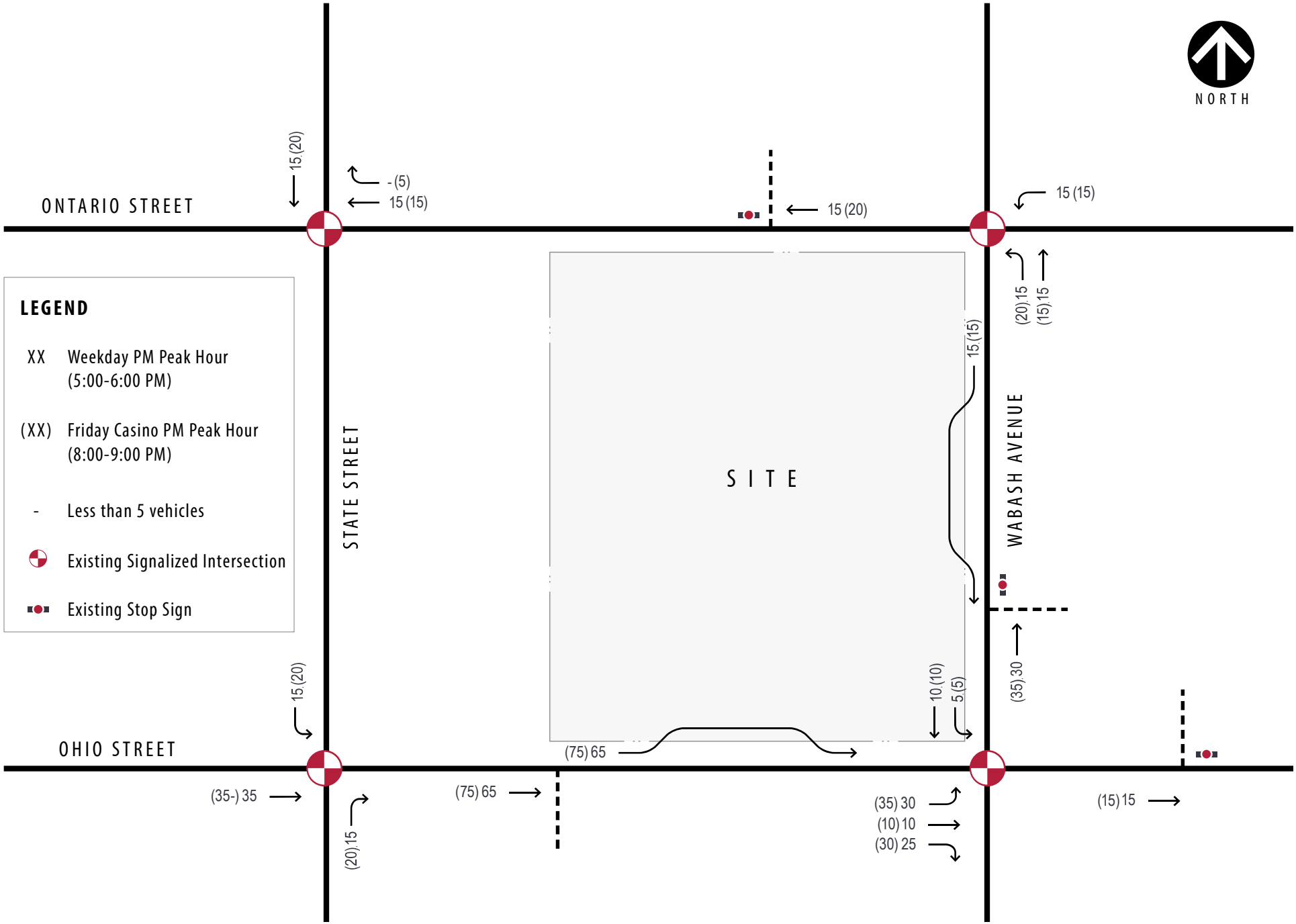
The total traffic assignment represents the combination of existing traffic volumes (Exhibit 1) and site traffic assignments (Exhibit 4 and Exhibit 5), reflecting the anticipated peak hour volumes at study intersections once the temporary venue is occupied and open. **Exhibit 6** presents the project total traffic assignment at the adjacent intersections.

Kimley»Horn

EXHIBIT 4

TEMPORARY CASINO LOCATION REVIEW

SITE TRAFFIC ASSIGNMENT (TO/FROM PARKING)

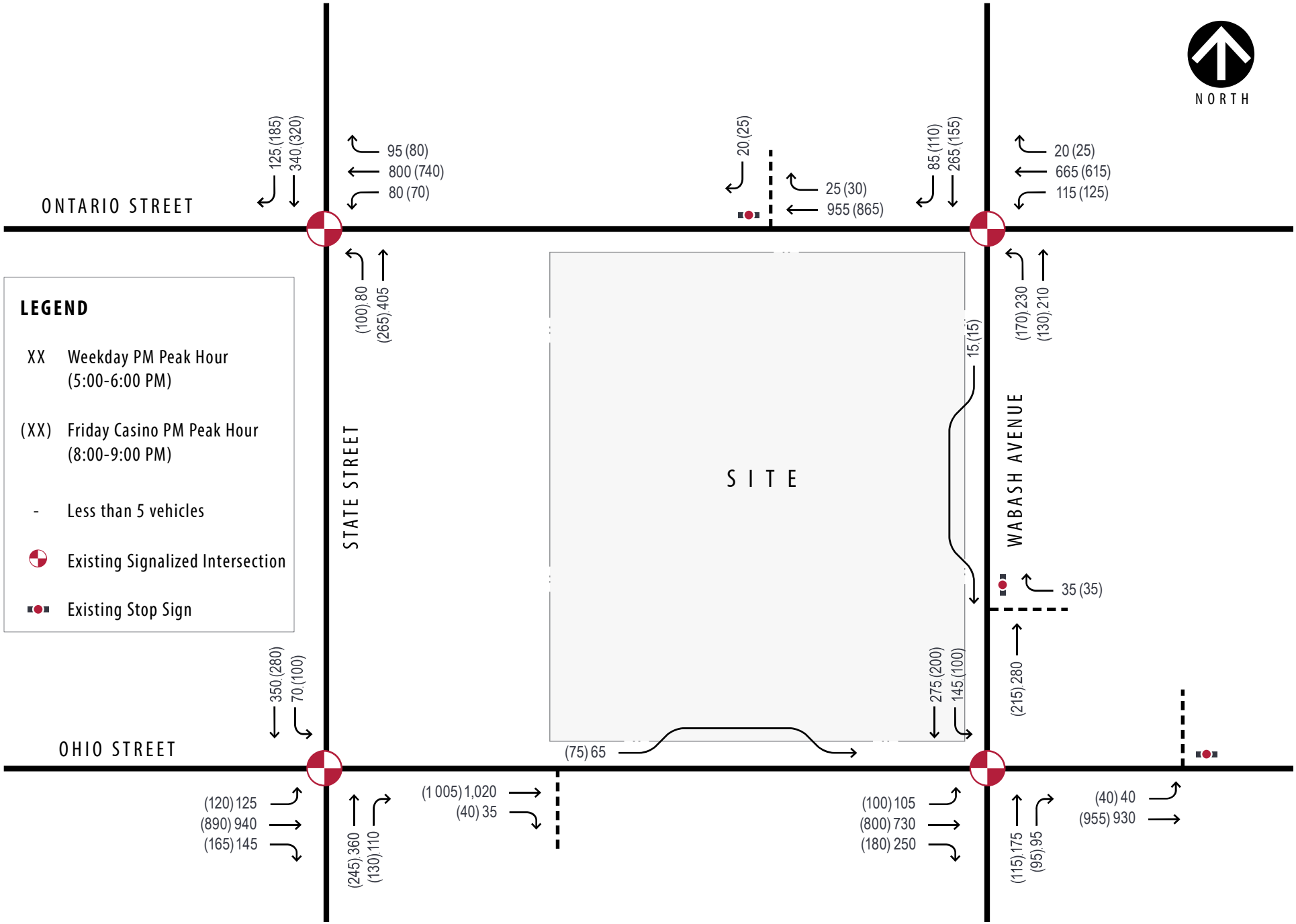


Kimley»Horn

EXHIBIT 5

TEMPORARY CASINO LOCATION REVIEW

SITE TRAFFIC ASSIGNMENT (TAXI + TNC TO/FROM CURB)



Kimley»Horn

EXHIBIT 6

TEMPORARY CASINO LOCATION REVIEW

TOTAL TRAFFIC ASSIGNMENT

PLAN EVALUATION

Capacity Analysis

Traffic capacity analyses were conducted to assess the existing and projected future motor vehicle operational conditions of the study intersections during the weekday peak hours. One measure of the capacity of an intersection to process traffic volumes is Level of Service (LOS). LOS is a measure of the anticipated average waiting time that a vehicle passing through an intersection would be expected to encounter. The Highway Capacity Manual (HCM) produced by the United States Transportation Research Board defines the descriptions and thresholds of wait time associated with each level of service. Detailed descriptions of each LOS rating can be found in **Table 5.**

Table 5. Level of Service Grading Descriptions[1]

Level of Service	Description
A	Minimal control delay; traffic operates at primarily free-flow conditions; unimpeded movement within traffic stream.
B	Minor control delay at signalized intersections; traffic operates at a fairly unimpeded level with slightly restricted movement within traffic stream.
C	Moderate control delay; movement within traffic stream more restricted than at LOS B; formation of queues contributes to lower average travel speeds.
D	Considerable control delay that may be substantially increased by small increases in flow; average travel speeds continue to decrease.
E	High control delay; average travel speed no more than 33 percent of free flow speed.
F	Extremely high control delay; extensive queuing and high volumes create exceedingly restricted traffic flow.

[1] Highway Capacity Manual, 6th Edition

LOS measures one dimension of an intersection's output for motor vehicles. It does not capture a project's potential benefits and outcomes, the performance for other modes of travel like walking, biking, and transit, nor the overall experience of a street in terms of safety and comfort for all users. Also, even from the perspective of motor vehicle traffic, LOS A is not inherently better than LOS B as vehicle capacity at intersections is not maximized at LOS A. LOS is a quantitative measurement of wait times. The range of expected wait times for each rating is shown in **Table 6** as defined by the HCM.

Table 6. Level of Service Grading Criteria[1]

Level of Service	Average Control Delay (s/veh) at:	
	Unsignalized Intersections	Signalized Intersections
A	0 – 10	0 – 10
B	> 10 – 15	> 10 – 20
C	> 15 – 25	> 20 – 35
D	> 25 – 35	> 35 – 55
E	> 35 – 50	> 55 – 80
F[2]	> 50	> 80

1 Highway Capacity Manual, 6th Edition

2 All movements with a Volume to Capacity (v/C) ratio greater than 1 receive a rating of LOS F.

Per CDOT practice, Synchro (version 11) software was utilized to evaluate capacity of the study intersections (reported overall and by approach) for the Weekday PM and Friday Casino PM peak hours. **Table 7** summarizes the capacity analysis results for existing and future peak hour traffic conditions.

Table 7. Intersection Capacity Analysis

Intersection	Existing Conditions				Future Conditions			
	AM Peak		PM Peak		AM Peak		PM Peak	
	Delay (s/veh)	LOS	Delay (s/veh)	LOS	Delay (s/veh)	LOS	Delay (s/veh)	LOS
Ohio Street / State Street *								
Eastbound	15	B	16	B	15	B	16	B
Northbound	37	D	24	C	42	D	26	C
Southbound	45	D	23	C	48	D	24	C
Intersection	*26*	*C*	*19*	*B*	*28*	*C*	*20+*	*B*
Ohio Street / Wabash Avenue *								
Eastbound	35	C	32	C	34	C	31	C
Northbound	11	B	11	B	11	B	11	B
Southbound	14	B	13	B	15	B	13	B
Intersection	*26*	*C*	*25*	*C*	*26*	*C*	*25*	*C*
Ontario Street / State Street *								
Westbound	7	A	8	A	9	A	9	A
Northbound	19	B	23	C	19	B	23	C
Southbound	14	B	14	B	14	B	14	B
Intersection	*12*	*B*	*13*	*B*	*13*	*B*	*13*	*B*
Ontario Street / Wabash Avenue *								
Westbound	26	C	26	C	26	C	26	C
Northbound	7	A	7	A	8	A	9	A
Southbound	14	B	10	B	15	B	12	B
Intersection	*18*	*B*	*19*	*B*	*18*	*B*	*19*	*B*

* Signalized Intersection

As shown in Table 7 under "Existing Conditions", the four adjacent intersections and their approaches operate at LOS D or better. Other factors, such as residual queuing from downstream intersections, temporary loss of a travel lane resulting from double parking or loading activity, and

pedestrians crossing outside of the designated walk/flashing don't walk phases, can impact capacity and traffic flows in ways that are not generally reflected in intersection capacity analysis. But based on the traffic volumes, conflicting pedestrian volumes, lane configurations, and traffic signal phasing/timing, the adjacent intersections currently provide acceptable capacity during the Weekday PM and the Friday PM Casino peak hours.

After adding projected traffic associated with a temporary 800-position casino to the adjacent intersections, the intersections are expected to operate with generally similar levels of service and average vehicle delay. The intersections and their approaches remain at LOS D or better during both peak hours. In some cases, average delays for some approaches drop a small amount due to additional traffic using individual movements that have excess capacity, causing the weighted average delay to drop. However, these instances are few and do not change the levels of service.

Based on the capacity analysis of projected future conditions, if the intersections and adjacent streets are properly managed to prevent and limit impacts of occurrences such as extended vehicle queues from downstream intersections, curbside activity spilling over into travel lanes, and pedestrian compliance with signals, the adjacent intersections are expected to accommodate peak hour traffic conditions.

Site Location and Access

Medinah Temple's location is conveniently situated in River North by virtue of being positioned between Ohio Street and Ontario Street, leading directly to and from the I-90/I-94 Feeder Ramps approximately one-half mile west of the site.

Parking

Several self-park opportunities (over 4,100 parking spaces of total capacity) are located within 1-2 blocks of the site, including directly south of the site (entry from Ohio Street) and the block immediately east of the site (also entered from Ohio Street). For vehicles arriving from the east on Ontario Street, the garage at 10 E. Ontario directly north of Medinah Temple offers a convenient and proximate parking location.

Curbside Loading

The site's curbside frontage on the north side of Ohio Street presents a direct route from I-90/I-94 and good opportunity for casino patrons to be dropped off or picked up (capacity of at least 9 vehicles). For traffic arriving from the east on Ontario Street, the west side of Wabash Avenue is available to accommodate curbside patron drop-off/ick-up activity. Additionally, the west side of Wabash Avenue is recommended to serve as a designated loading zone for charter/shuttle buses as the bus door would be located on the same side of the street as the site and passengers would not have to cross the street.

Buses would not be allowed to stage curbside at the site or in the surrounding area. Buses would be directed to park at designated bus parking zones near the downtown area before returning to pick up passengers. City-designated charter bus parking areas include Kinzie Street (between Des Plaines Street and Union Avenue), Canal Street (east side south of Roosevelt Road), and Green Street (east side between Kinzie Street and Carroll Avenue).

To limit the volume and demand for curb frontage along the site, valet parking is not recommended at the site and those driving personal vehicles should be directed to nearby parking garages, for which there are multiple proximate options within 1-2 blocks of the site. However, within a garage, some consideration should be given to establishing an internal valet option. This provides patrons that drive an opportunity to access higher levels of service and safety by limiting the potential for patrons to be walking through garages for their parked car after they have visited the casino.

Exhibit 7 illustrates a conceptual curbside loading plan for a temporary casino at the Medinah Temple.

An estimate of peak activity was projected based upon a M/M/S queuing model that factors random arrivals and average service times for taxi/TNC and charter/shuttle bus activity given the available number of curbside spaces along Ohio Street and Wabash Avenue.

Trip generation projections detailed previously in Table 2 were referenced to estimate the number of taxi/TNC trips for the busiest hour (45 vehicles dropping off + 45 vehicles picking up). Additionally, based on the expected 5 percent of traffic being limos and third-party vehicles, 15 charter/shuttle buses are assumed.

The average service time for a taxi/TNC drop-off was assumed as one minute, which includes time for the vehicle to enter the loading zone, for the passengers to pay the taxi fare or complete mobile app transaction, to unload the vehicle, and finally for the vehicle to leave the loading zone. This is considered a conservative estimate as TNCs and some taxi providers handle fare payment through an online mobile transaction and not in the vehicle with cash or credit cards; thus, the service time when being dropped off is less than that of a traditional taxi ride.

As a conservative approach, the average service time for taxi/TNC pick-ups was assumed as 1 minute even though as less time is needed compared to a drop off since a fare does not need to be paid. In order to further complete a conservative review of curbside demand, it was assumed that projected taxi trips would either drop off or pick up a passenger; in reality, some taxis that drop off a passenger will also pick up a new passenger, resulting in the consolidation of taxi trips to/from the site.

With respect to charter/shuttle buses, the average service time at the curb was assumed as five minutes, which includes time for the bus to arrive and for passengers to load/unload.

Table 8 outlines the 85th percentile projected peak curbside activity along the north side of Ohio Street adjacent to the site (9 curbside spaces at approximately 25 feet per space). Based on the results of the queuing model, a 9-space loading zone would provide adequate capacity and handle the projected 85th percentile queues for taxi and TNC trips during the evening casino peak hour. **Table 9** similarly outlines the 85th percentile projected peak curbside activity along the west side of Wabash Avenue adjacent to the site (3 curbside spaces at approximately 50 feet per space) for charter/shuttle buses. As shown, the projected 85th percentile is 2 buses, which can be accommodated by the site frontage on Wabash Avenue.

Table 8. 85th Percentile Projected Peak Curbside Activity (Ohio Street Taxi/TNC Loading Zone)

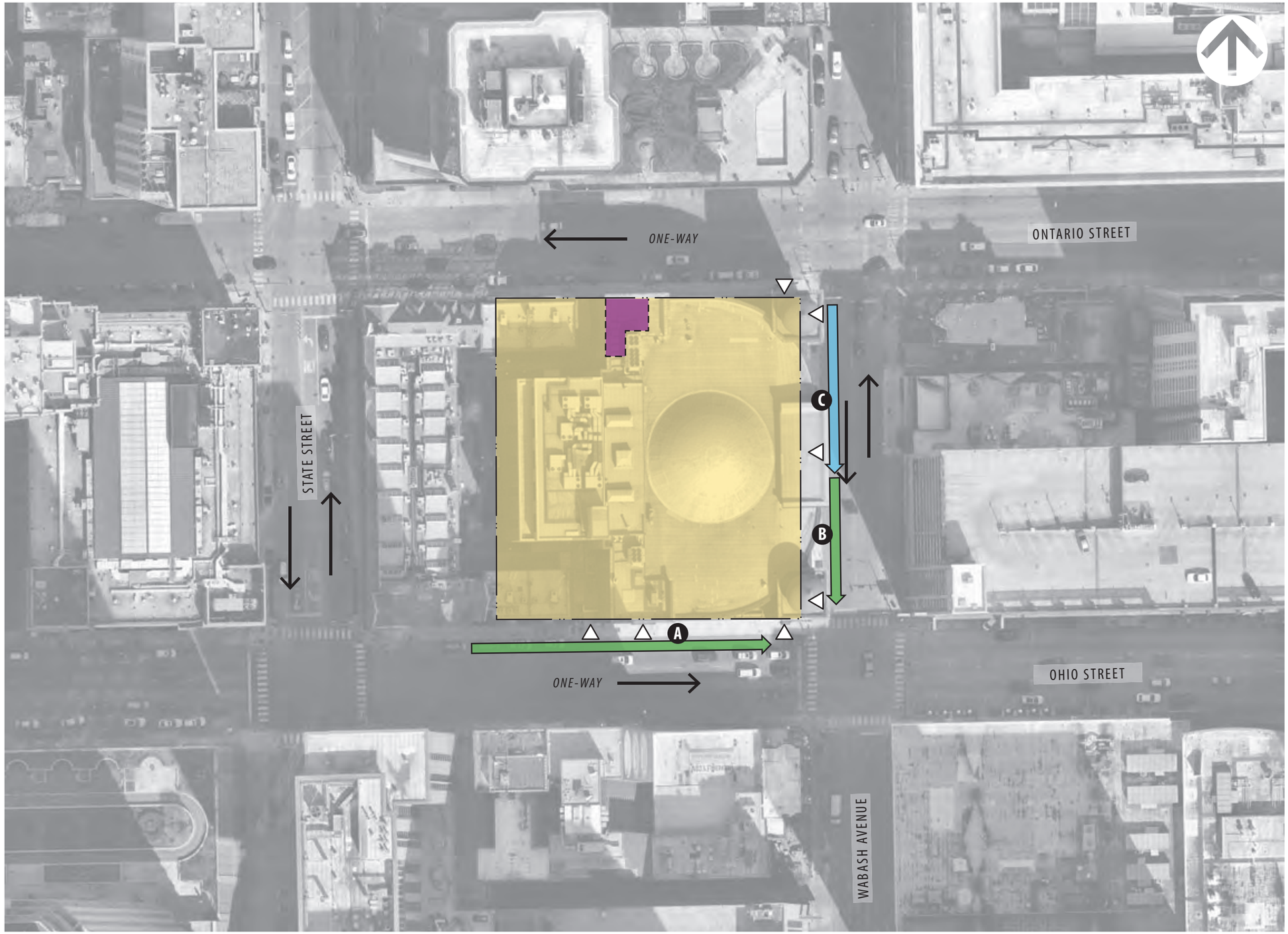
Description	Ohio Street Curbside Loading (Taxi/TNC)
Taxi/TNP Drop-Off	
Number of Vehicles Dropping Curbside during the Peak Hour	45
Average Time per Service (minutes) [1]	1
Taxi/TNP Pick-Up[4]	
Number of Vehicles Arriving Curbside during the Peak Hour	45
Average Time per Service (minutes) [1]	1
Total	
Number of Vehicles Arriving Curbside during the Peak Hour	90
Weighted Average Time per Service (minutes)	1
Service Rate (vehicles per hour per position)	60
Number of Curbside Service Positions	9
85th Percentile Probability Queue (vehicles) [2]	2.33

1 – Estimated by Kimley-Horn
2 -- Based on M/M/S queuing model

Table 9. 85th Percentile Projected Peak Curbside Activity (Wabash Avenue Charter/Shuttle Bus Loading Zone)

Description	Wabash Avenue Curbside Loading (Charter/Shuttle Bus)
Charter/Shuttle Bus Pick-Up/Drop-Off	
Number of Vehicles Dropping Off and Picking Up Curbside during the Peak Hour	15
Average Time per Service (minutes) [1]	5
Total	
Number of Vehicles Arriving Curbside during the Peak Hour	15
Weighted Average Time per Service (minutes)	5
Service Rate (vehicles per hour per position)	12
Number of Curbside Service Positions	3
85th Percentile Probability Queue (vehicles) [2]	2.06

1 – Estimated by Kimley-Horn
2 -- Based on M/M/S queuing model



LEGEND

- Medinah Temple (Temporary Site)
- Loading Dock / Refuse Compactor
- Taxi/TNC Curbside Loading
- Charter/Shuttle Bus Curbside Loading

A Ohio Street Taxi/TNC Loading Zone (Approx. 9 vehicles)

B Wabash Avenue Taxi/TNC Loading Zone (Approx. 3 vehicles)

C Wabash Avenue Charter/Shuttle Bus Loading Zone (Approx 2-3 buses)

EXHIBIT 7

TEMPORARY CASINO LOCATION REVIEW

CURBSIDE LOADING CONCEPT | MEDINAH TEMPLE

Area Traffic Conditions

While Medinah Temple offers a direct route to/from I-90/94, good accessibility from transit, and is situated in a highly walkable urban neighborhood close to many hotels, shopping, and restaurant venues, traffic conditions in River North on Friday and Saturday evenings when casino activity peaks can be very busy and challenging for drivers. Curbside zones for passenger loading/unloading are available but must be heavily managed and patrolled with appropriate staffing and controls (i.e., attendants, greeters, and traffic control personnel/police officers) to keep vehicles from double parking and queuing beyond adjacent intersections or around the block.

For the Medinah Temple site to be successful from a transportation standpoint, incentives for use of transit would be helpful and patrons who drive their personal vehicles should self-park to limit curbside demand along public streets like Ohio Street and Wabash Avenue. If Ohio Street were to lose capacity due to overflowing drop-off/pick-up activity, it would likely result in considerable congestion along a key access corridor through River North and to Michigan Avenue and Streeterville as nearby retail shopping, restaurant, and entertainment uses are also busy.

Loading / Delivery

Medinah Temple maintains a loading dock and trash compactor/bay accessible via Ontario Street on the north side of the site. To limit impacts on both typical weekday peak hours and peak casino activity (later evenings, particularly late in the week), deliveries and refuse collection should be scheduled and focused on weekday midday periods and weekend mornings when both the adjacent streets and the casino itself exhibit relatively low activity levels.

SUMMARY

Based on Kimley-Horn's site visit and high-level review, we offer the following key findings:

- The site is well-positioned to serve visitors and employees via car, transit, or on foot.
- For those driving, the site is located between the Ohio Street and Ontario Street corridors that provide direct access routes to and from I-90/94. Parking for those driving is available across several garages located within 1-2 blocks of the site and providing a total capacity of over 4,100 spaces.
- The surrounding area is highly walkable and experiences significant pedestrian traffic. The site is also within close proximity of several hotel options and nearby restaurants that would serve as likely casino-generated pedestrian trip origins or destinations.
- The site is also highly accessible by both CTA rail and bus transit options. Casino patron use of transit may not be as high as employee use, but the CTA Red Line station at Grand Avenue is approximately one block from the subject site.
- Curbside zones along the north side of Ohio Street and west side of Wabash Avenue are available to serve as drop-off/pick-up zones for taxis/TNCs.
- Charter/Shuttle buses are recommended to be oriented to the west side of Wabash Avenue for passenger loading/unloading. This location can accommodate at least 3 charter buses and is expected to handle the anticipated casino peak hour drop-off/pick-up demands.
- To be effective, extensive active management and traffic control of these zones on Ohio Street and Wabash Avenue will be needed to prohibit double parking and extended vehicle queuing through adjacent intersections to avoid neighborhood traffic impacts. Traffic Control Aides (TCAs) are recommended at the following locations with the roles outlined below:
    - Ohio Street / State Street
        - *Keep the intersection clear from extended downstream queuing so that adjacent traffic flows are not blocked when traffic signal phases change.*
        - *Orient vehicles to the curbside loading zone on Ohio Street.*
        - *Direct pedestrians through the intersection while also enforcing pedestrian clearance times so that vehicles waiting to turn are not impacted by pedestrians starting to cross late in the pedestrian countdown clearance phase.*
    - Ohio Street (Wabash Avenue to State Street)
        - *Prevent double parking and loading in travel lanes.*
        - *Prohibit vehicles from standing/staging along the north side of Ohio Street so that vehicles are only actively dropping off/picking up passengers.*
    - Ohio Street / Wabash Avenue
        - *Keep the intersection clear from extended downstream queuing so that adjacent traffic flows are not blocked when traffic signal phases change.*

        - *Direct pedestrians through the intersection while also enforcing pedestrian clearance times so that vehicles waiting to turn are not impacted by pedestrians starting to cross late in the pedestrian countdown clearance phase.*

    - Ontario Street / Wabash Avenue
        - *Keep the intersection clear from extended downstream queuing so that adjacent traffic flows are not blocked when traffic signal phases change.*
        - *Orient vehicles, particularly charter/shuttle to the curbside loading zone on Wabash Avenue.*
        - *Direct pedestrians through the intersection while also enforcing pedestrian clearance times so that vehicles waiting to turn are not impacted by pedestrians starting to cross late in the pedestrian countdown clearance phase.*

    - Wabash Avenue (Ontario Street to Ohio Street)
        - *Prevent double parking and loading in travel lanes.*
        - *Prohibit vehicles from standing/staging along the west side of Wabash Avenue so that vehicles are only actively dropping off/picking up passengers.*

    - Ohio Street (Wabash Avenue to State Street)
        - *Prevent double parking and loading in travel lanes.*
        - *Prohibit vehicles from standing/staging along the north side of Ohio Street so that only vehicles actively dropping off/picking up passengers are permitted.*

    - Ontario Street (Wabash Avenue to State Street)
        - *Prevent double parking and loading in travel lanes.*

    TCA staffing and roles are subject to review and approval by the Office of Emergency Management and Communications (OEMC).

- Incentives to promote use of nearby CTA rail and bus transit options are recommended.
- Providing curbside valet service is not recommended to limit curbside loading demands. Those that drive should use nearby publicly-accessible parking garages. However, off-street valet service within a garage should be considered to provide safe vehicle access after exiting the casino.
- If Ohio Street were to lose capacity due to overflowing drop-off/pick-up activity, it would likely result in considerable congestion along a key access corridor with potential spillover to adjacent intersecting streets.
- A delivery/service dock with a trash compactor is accessible via Ontario Street. To limit impacts on traffic conditions and peak activity along adjacent streets as well as at the casino itself, deliveries and trash pick-up should be scheduled with vendors to occur midday weekdays (9 AM – 4 PM) and weekend mornings (before 12:00 PM).

These conclusions are based on an initial review of transportation infrastructure and conditions in the area and at Medinah Temple. A formal transportation management plan should be developed in coordination with CDOT and Alderman Reilly's office prior to commencing temporary casino operations at the site.