

City of Lawrence
Traffic Safety Commission Agenda
May 3, 2010-7:00 PM
City Commission Room, City Hall

MEMBERS: Jim Woods, Chair; Ken Miller, Vice-Chair; Scott Criqui, Dan Harden; Richard Heckler; Jason Novotny; Edwin Rockrock and Robin Smith.

Anyone who wishes to be notified when an item will be heard by the City Commission must provide their name and a telephone number or an e-mail address.

ITEM NO. 1: Review and approve the minutes of the Traffic Safety Commission meeting, April 5, 2010.

ITEM NO. 2: Consider request to establish NO PARKING along the north side of 13th Street between Oread Avenue and Louisiana Street.

Facts:

1. 13th Street is paved approximately 25 feet wide.
2. NO Parking is currently established by city code along the south side of the street.

ITEM NO. 3: Consider establishing a MULTIWAY STOP at the intersection of 11th Street & Louisiana Street.

Facts:

1. 11th Street is classified as a "collector" street and Louisiana Street is classified as a "local" street.
2. The criteria for consideration of a MULTIWAY STOP are found in the *Manual on Uniform Traffic Control Devices* (attached).

3. Traffic counts taken on 14-15 April 2010 show that the minimum required volume of traffic needed to consider a MULTIWAY STOP is not met, even when including the traffic exiting the private driveway on the north leg of the intersection.
4. Police Department crash records show that there has not been a reported crash at this intersection since 2004.
5. Therefore, it does not appear that a MULTIWAY STOP can be justified at this intersection.

ITEM NO. 4: Consider establishing a MULTIWAY STOP at the intersection of 11th Street & Indiana Street.

Facts:

1. 11th Street is classified as a "collector" street and Indiana Street is classified as a "local" street.
2. The criteria for consideration of a MULTIWAY STOP are found in the *Manual on Uniform Traffic Control Devices* (attached).
3. Traffic counts taken on 14-15 April 2010 show that the minimum required volume of traffic needed to consider a MULTIWAY STOP is not met.
4. Police Department crash records show that there were 2 reported crashes in 2005, 6 reported crashes in 2006, 2 reported crashes in 2007 and 6 reported crashes in 2008, when STOP signs were in place stopping the major flow of traffic.
5. Therefore, it does not appear that a MULTIWAY STOP can be justified at this intersection.

ITEM NO. 5: Consider establishing a MULTIWAY STOP at the intersection of 11th Street (east leg) & Mississippi Street.

Facts:

1. Both Mississippi Street (to the north) and 11th Street are classified as "collector" streets.
2. The criteria for consideration of a MULTIWAY STOP are found in the *Manual on Uniform Traffic Control Devices* (attached).

3. Traffic counts taken on 14-15 April 2010 show that the minimum required volume of traffic needed to consider a MULTIWAY STOP is not met; however, if traffic from the private driveway on the west leg of the intersection is included, the criteria may be met. That data will be collected and provided at the meeting.
4. If a MULTIWAY STOP is established, the private driveway should be reconstructed in order to install the STOP sign closer to the intersection. Currently, the temporary STOP is installed approximately 60 feet south of the intersection; this can cause confusion for motorists and reduce the visibility for westbound motorists on 11th Street turning south onto Mississippi Street.

ITEM NO. 6: Public Comment.

ITEM NO. 7: Commission Items.

ITEM NO. 8: Miscellaneous.

City Commission action on previous recommendations:

None.

David Woosley

From: Robert Nugent
Sent: Thursday, April 08, 2010 10:16 AM
To: David Woosley; Shoeb Uddin; Charles Soules
Cc: 'Kaiser, Danny'
Subject: Agenda Item: Traffic Safety Commission
Attachments: 13th Parking.jpg

I would like to submit the following item to be placed on the agenda for the next Traffic Safety Commission Meeting:

“Permanent Removal of Parking on the north side of 13th Street between Oread Street and Louisiana”

During the construction of the Oread Hotel rerouting of transit service was necessary. In order to accommodate this rerouting parking was temporarily removed on north side of 13th Street between Oread Avenue and Louisiana Street (see attachment). With the construction complete the Public Transit Department, with support of KU Parking and Transit, would like to request a permanent removal of these spaces. Combined we currently operate approximately 350 trips a day though this portion of the route which ultimately allows service to access both GSP and Corbin Halls which are located just north of 11th Street. If parking were reinstated on this section of 13th Street five separate routes would have to be changed and would ultimately force service away from existing ridership and into more narrow streets in residential areas. Thank you for your consideration.

*Robert A. Nugent, Transit Administrator
Lawrence Transit System
P.O. Box 708
Lawrence, KS 66044
Phone: (785) 832-3464
Fax: (785) 832-3462
www.lawrencetransit.org*



Louisiana St

Ohio St

Tennessee St

College Dr (P)

Japanese:

W 11th St

Community Build

Bus Routes

W 12th St

Requested Area for Permanent Parking Removal

Oread Ave

W 13th St



ALL WAY Stop Warrant Worksheet



Date: 14-15 April 2010

Location: 11th Street & Louisiana Street

Time Period	11th Street							Louisiana Street						Grand Total	
	EBLL	EB	EBRL	WBLL	WB	WBRL	Total	NBLL	NB	NBRL	SBLL	SB*	SBRL		Total
12-01		23			19		42		24			11		35	77
01-02		12			22		34		19			8		27	61
02-03		10			8		18		19			8		27	45
03-04		3			3		6		5			0		5	11
04-05		6			4		10		3			4		7	17
05-06		8			3		11		5			5		10	21
06-07		9			11		20		18			17		35	55
07-08		42			62		104		40			56		96	200
08-09		51			88		139		88			63		151	290
09-10		81			91		172		67			39		106	278
10-11		75			72		147		76			51		127	274
11-12		114			65		179		66			58		124	303
12-01		133			90		223		91			62		153	376
01-02		97			83		180		80			47		127	307
02-03		128			91		219		84			49		133	352
03-04		144			104		248		97			49		146	394
04-05		175			87		262		96			57		153	415
05-06		156			103		259		95			62		157	416
06-07		125			90		215		81			55		136	351
07-08		110			80		190		73			47		120	310
08-09		68			73		141		76			32		108	249
09-10		97			67		164		75			38		113	277
10-11		53			43		96		60			39		99	195
11-12		47			27		74		33			33		66	140
Totals	0	1767	0	0	1386	0	3153	0	1371	0	0	890	0	2261	5414

The Manual on Uniform Traffic Control Devices (MUTCD) requires an average of **300** vehicles per hour entering the intersection from the main street for each of 8 hours of a day, and an average of **200** entering from the minor street during the same 8 hours.

* Private driveway; not a public street

Average entering volume on main street for 8 highest hours = **225**

Average minor street volume for same 8 hours = **141**

Section 2B.07 Multiway Stop Applications

Support:

Multiway stop control can be useful as a safety measure at intersections if certain traffic conditions exist. Safety concerns associated with multiway stops include pedestrians, bicyclists, and all road users expecting other road users to stop. Multiway stop control is used where the volume of traffic on the intersecting roads is approximately equal.

The restrictions on the use of STOP signs described in Section 2B.05 also apply to multiway stop applications.

Guidance:

The decision to install multiway stop control should be based on an engineering study.

The following criteria should be considered in the engineering study for a multiway STOP sign installation:

- A. Where traffic control signals are justified, the multiway stop is an interim measure that can be installed quickly to control traffic while arrangements are being made for the installation of the traffic control signal.
- B. A crash problem, as indicated by 5 or more reported crashes in a 12-month period that are susceptible to correction by a multiway stop installation. Such crashes include right- and left-turn collisions as well as right-angle collisions.
- C. Minimum volumes:
 1. The vehicular volume entering the intersection from the major street approaches (total of both approaches) averages at least 300 vehicles per hour for any 8 hours of an average day, and
 2. The combined vehicular, pedestrian, and bicycle volume entering the intersection from the minor street approaches (total of both approaches) averages at least 200 units per hour for the same 8 hours, with an average delay to minor-street vehicular traffic of at least 30 seconds per vehicle during the highest hour, but
 3. If the 85th-percentile approach speed of the major-street traffic exceeds 65 km/h or exceeds 40 mph, the minimum vehicular volume warrants are 70 percent of the above values.
- D. Where no single criterion is satisfied, but where Criteria B, C.1, and C.2 are all satisfied to 80 percent of the minimum values. Criterion C.3 is excluded from this condition.

Option:

Other criteria that may be considered in an engineering study include:

- A. The need to control left-turn conflicts;
- B. The need to control vehicle/pedestrian conflicts near locations that generate high pedestrian volumes;
- C. Locations where a road user, after stopping, cannot see conflicting traffic and is not able to reasonably safely negotiate the intersection unless conflicting cross traffic is also required to stop; and
- D. An intersection of two residential neighborhood collector (through) streets of similar design and operating characteristics where multiway stop control would improve traffic operational characteristics of the intersection.



ALL WAY Stop Warrant Worksheet



Date: 14-15 April 2010

Location: 11th Street & Indiana Street

Time Period	11th Street							Indiana Street							Grand Total
	EBLL	EB	EBRL	WBLL	WB	WBRL	Total	NBLL	NB	NBRL	SBLL	SB	SBRL	Total	
12-01		28			33		61		23			11		34	95
01-02		22			29		51		21			8		29	80
02-03		15			10		25		11			8		19	44
03-04		6			9		15		5			0		5	20
04-05		3			5		8		7			4		11	19
05-06		6			8		14		1			5		6	20
06-07		12			17		29		13			17		30	59
07-08		51			97		148		34			56		90	238
08-09		100			153		253		72			63		135	388
09-10		122			133		255		71			39		110	365
10-11		135			139		274		114			51		165	439
11-12		161			107		268		115			58		173	441
12-01		173			145		318		126			62		188	506
01-02		151			146		297		118			47		165	462
02-03		189			158		347		117			49		166	513
03-04		196			173		369		115			49		164	533
04-05		225			168		393		134			57		191	584
05-06		193			179		372		126			62		188	560
06-07		158			151		309		109			55		164	473
07-08		120			122		242		106			47		153	395
08-09		99			111		210		88			32		120	330
09-10		110			112		222		105			38		143	365
10-11		63			78		141		47			39		86	227
11-12		63			43		106		37			33		70	176
Totals	0	2401	0	0	2326	0	4727	0	1715	0	0	890	0	2605	7332

The Manual on Uniform Traffic Control Devices (MUTCD) requires an average of **300** vehicles per hour entering the intersection from the main street for each of 8 hours of a day, and an average of **200** entering from the minor street during the same 8 hours.

Average entering volume on main street for 8 highest hours = **334**

Average minor street volume for same 8 hours = **175**

Section 2B.05 STOP Sign Applications

Guidance:

STOP signs should be used if engineering judgment indicates that one or more of the following conditions exist:

- A. Intersection of a less important road with a main road where application of the normal right-of-way rule would not be expected to provide reasonable compliance with the law;
- B. Street entering a through highway or street;
- C. Unsignalized intersection in a signalized area; and/or
- D. High speeds, restricted view, or crash records indicate a need for control by the STOP sign.

Standard:

Because the potential for conflicting commands could create driver confusion, STOP signs shall not be installed at intersections where traffic control signals are installed and operating except as noted in Section 4D.01.

Portable or part-time STOP signs shall not be used except for emergency and temporary traffic control zone purposes.

Guidance:

STOP signs should not be used for speed control.

STOP signs should be installed in a manner that minimizes the numbers of vehicles having to stop. At intersections where a full stop is not necessary at all times, consideration should be given to using less restrictive measures such as YIELD signs (see Section 2B.08).



ALL WAY Stop Warrant Worksheet



Date: 14-15 April 2010

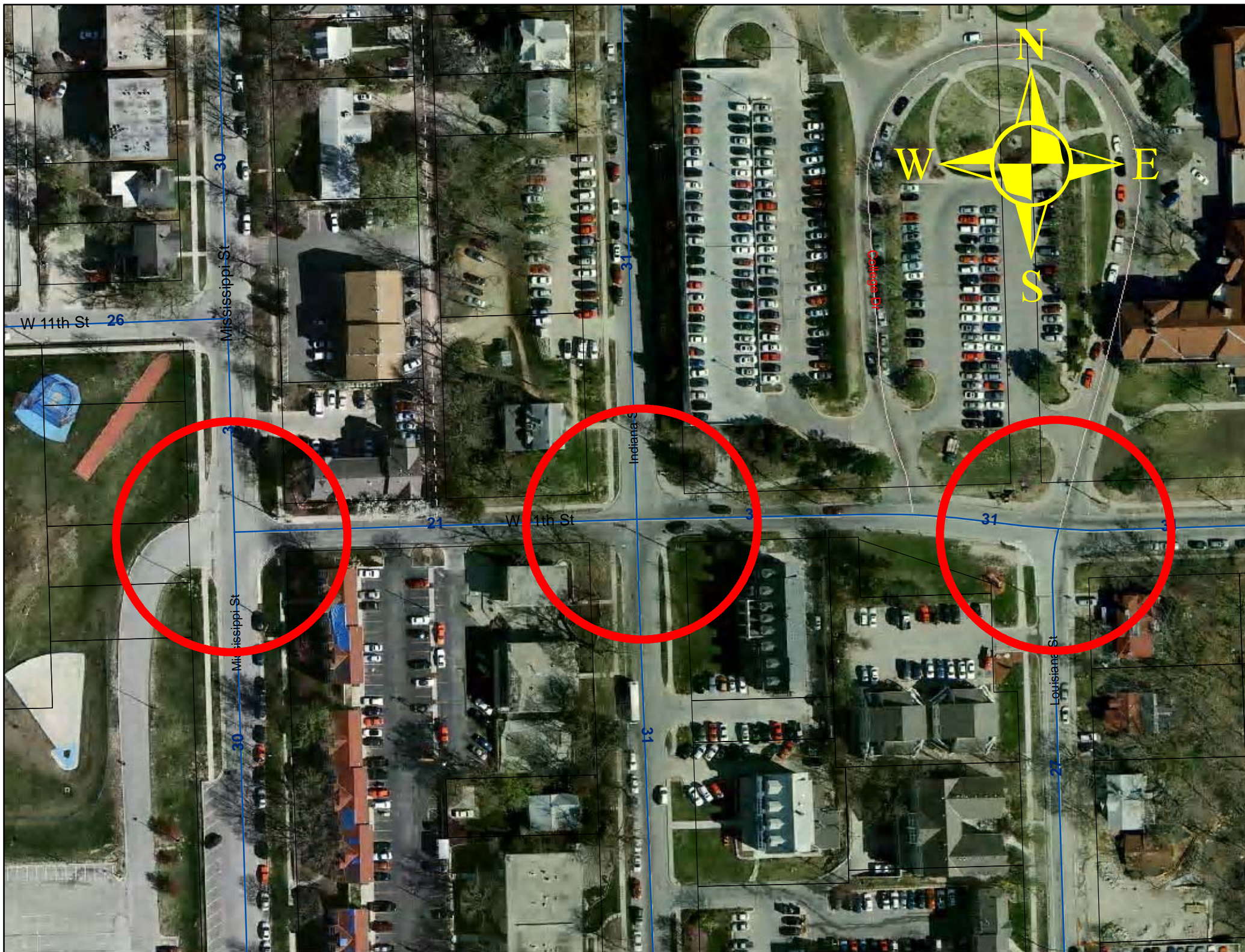
Location: 11th Street (east leg) & Mississippi Street

Time Period	Mississippi Street							11th Street							Grand Total
	NBLL	NB	NBRL	SBLL	SB	SBRL	Total	EBLL	EB	EBRL	WBLL	WB	WBRL	Total	
12-01		20			33		53					37		37	90
01-02		8			30		38					29		29	67
02-03		4			21		25					14		14	39
03-04		9			9		18					10		10	28
04-05		6			13		19					4		4	23
05-06		2			15		17					8		8	25
06-07		10			35		45					17		17	62
07-08		33			184		217					83		83	300
08-09		53			326		379					153		153	532
09-10		93			258		351					142		142	493
10-11		119			277		396					142		142	538
11-12		135			232		367					130		130	497
12-01		188			288		476					172		172	648
01-02		132			233		365					148		148	513
02-03		190			285		475					195		195	670
03-04		171			263		434					184		184	618
04-05		193			246		439					210		210	649
05-06		253			265		518					191		191	709
06-07		109			255		364					172		172	536
07-08		63			176		239					154		154	393
08-09		83			152		235					134		134	369
09-10		71			162		233					129		129	362
10-11		32			92		124					76		76	200
11-12		36			58		94					48		48	142
Totals	0	2013	0	0	3908	0	5921	0	0	0	0	2582	0	2582	8503

The Manual on Uniform Traffic Control Devices (MUTCD) requires an average of **300** vehicles per hour entering the intersection from the main street for each of 8 hours of a day, and an average of **200** entering from the minor street during the same 8 hours.

Average entering volume on main street for 8 highest hours = **435**

Average minor street volume for same 8 hours = **177**





Approximate location
of temporary STOP
sign



W 11th St
26

Mississippi St
30

W 11th St
21

Mississippi St
30

City of Lawrence
Traffic Safety Commission
May 3, 2010 Minutes

MEMBERS PRESENT: Jim Woods, Chair; Ken Miller, Vice-Chair; Dan Harden; Richard Heckler; Jason Novotny, Edwin Rothrock; and Robin Smith.

STAFF PRESENT: David Woosley, Public Works Department

Chair Jim Woods called the meeting to order at 7:00 p.m. in the City Commission Room, City Hall, 6 E. 6th Street.

ITEM NO. 1:

Review and approve the minutes of the Traffic Safety Commission meeting, April 5, 2010.

MOTION BY COMMISSIONER HARDEN, SECONDED BY COMMISSIONER SMITH, TO APPROVE THE MINUTES OF THE TRAFFIC SAFETY COMMISSION MEETING, APRIL 5, 2010; THE MOTION WAS APPROVED 7-0.

ITEM NO. 2:

Consider request to establish NO PARKING along the north side of 13th Street between Oread Avenue & Louisiana Street.

David Woosley presented the information provided in the staff report.

Public comment:

Danny Kaiser, University of Kansas Transit: I'm here to speak in favor of this request. During the Oread Hotel construction, buses were re-routed on 13th Street; this proved to be an easier route for us to take than 12th Street had been. This parking has been temporarily removed for a year and a half now and has worked well; both City and KU buses are able to make the turns and we ask that you lend your support to this request.

Commissioner Smith asked whether NO PARKING is needed at all times or just during certain hours; Kaiser advised that it would be preferable to have it at all times since late night buses are run on Friday and Saturday nights.

Commissioner Harden: The width of the street is inadequate to allow parking and also permit two-way traffic with eight-foot-wide buses.

Commissioner Smith: I tend to agree; particularly with the blue KU buses.

MOTION BY COMMISSIONER HARDEN, SECONDED BY COMMISSIONER HECKLER, TO RECOMMEND ESTABLISHING NO PARKING ALONG THE NORTH SIDE OF 13TH STREET BETWEEN OREAD AVENUE AND LOUISIANA STREET; THE MOTION WAS APPROVED 7-0.

ITEM NO. 3:

Consider establishing a MULTIWAY STOP at the intersection of 11th Street & Louisiana Street.

David Woosley presented the information provided in the staff report.

Commissioner Rothrock asked if there have been any pedestrian crashes at the intersection; Woosley advised that there is no record of any during the past six years that staff has been collecting pedestrian crash data.

Commissioner Smith asked if that isn't one of the intersections that salt trucks have difficulty stopping and starting on; Woosley advised that it is, as well as others in the area that are even worse and the street division of public works has expressed concern with all the STOP signs along 11th Street.

Public comment:

Doug Riat, University of Kansas, Director of Facilities Operation and Planning: We are asking you to give over-riding consideration to pedestrian safety, rather than the threshold and meeting the criteria in terms of the traffic counts. I know that the STOP signs were put-in as a temporary measure during construction of the Oread Hotel, but that has been a real help for pedestrian safety and hopefully prevent accidents. It would be unfortunate to have to wait for those kinds of numbers to be reported and then take action rather than to take the opportunity to leave the STOP signs in place when they are already there. There are currently over 575 students in the GSP-Corbin complex which are the students that are walking to-and-from campus each day; and there is the

potential to have over 700 students there. We would ask that you give consideration to pedestrian safety as an over-riding factor rather than just the vehicle counts and to leave the STOP signs that are currently in place.

Jennifer Wamelink, University of Kansas Student Housing: There are many students that are passionate about wanting the STOP signs to remain; they feel that it has enhanced the safety as they are frequent pedestrians crossing that intersection. It is very difficult for pedestrians standing at the intersection to see traffic coming-up the hill from the west. I would encourage you to keep those STOP signs in place; it seems like the right thing to do.

Commissioner Woods: It doesn't meet the criteria and I would err on the side of the guys driving the salt trucks in the wintertime and everyone else with a standard transmission. That has been an open intersection east-west as long as I can remember and I'm not in favor of changing it.

Commissioner Harden: It doesn't meet the criteria and I guess the problem we get into is that every intersection is potentially dangerous and you can always run the safety issue up the flagpole; then everything gets approved because everything is potentially dangerous. That's why we have the criteria, to evaluate the depth of that potential. In this case, what it's telling us is, yes, there is a potential there, but it's not very severe.

Commissioner Novotny: I'm kind of in favor of this one just because of GSP being located there; because of the students that do reside there that go back-and-forth to campus.

Commissioner Heckler: I'm kind of leaning towards the safety of the residents on this one.

Commissioner Rothrock: I used to live down the block and that is a very scary place to cross.

MOTION BY COMMISSIONER HECKLER, SECONDED BY COMMISSIONER SMITH, TO RECOMMEND ESTABLISHING A MULTIWAY STOP AT THE INTERSECTION OF 11TH STREET & LOUISIANA STREET; THE MOTION WAS APPROVED 5-2 (Woods: I don't see any reason to change it without an accident pattern and no pedestrians have been hit and it doesn't meet the criteria; Harden: It doesn't meet the criteria.)

ITEM NO. 4:

Consider establishing a MULTIWAY STOP at the intersection of 11th Street & Indiana Street.

David Woosley presented the information provided in the staff report.

Commissioner Heckler noted that the letter from the University of Kansas supported stopping Indiana Street traffic and allowing 11th Street to flow freely; this would facilitate bus traffic, particularly during inclement weather.

Public comment:

Doug Riat, University of Kansas, Director of Facilities Operation and Planning:
The University would be in favor of a MULTIWAY STOP at the intersection of 11th Street & Indiana Street, but if you chose not to establish a MULTIWAY STOP, we believe that traffic flow would be improved by having through traffic on 11th Street compared to way it was before the temporary STOP signs. The hill really is particularly steep at this particular intersection and it's helpful for the bus traffic to not have to come to a stop at Indiana Street in either direction. In addition, the majority of the student pedestrian is moving east-west.

Commissioner Miller: The right thing seems to be to stop the traffic on Indiana Street.

MOTION BY COMMISSIONER HECKLER, SECONDED BY COMMISSIONER MILLER, TO RECOMMEND REMOVING THE STOP SIGNS ON 11TH STREET AT INDIANA STREET AND ESTABLISHING STOP SIGNS ON INDIANA STREET AT 11TH STREET; THE MOTION WAS APPROVED 7-0.

ITEM NO. 5:

Consider establishing a MULTIWAY STOP at the intersection of 11th Street (east leg) & Mississippi Street.

David Woosley presented the information provided in the staff report.

Public comment:

Doug Riat, University of Kansas, Director of Facilities Operation and Planning:
We would be supportive of the MULTIWAY STOP at 11th Street & Mississippi Street; we believe it has improved both the pedestrian and traffic flow in that

area; and we are willing to reconstruct our driveway to facilitate proper location of the STOP sign.

Betty Alderson, 1920 Maine Street: This is one STOP sign that I find very annoying and unnecessary. If you come east on 11th Street you stop at Mississippi Street; if you make a right-turn, you stop again, almost immediately; and I consider Mississippi Street from 9th Street to the university a pathway to the university and don't find any need for this. As a driver and someone who has been around a couple of days, I would certainly open Mississippi Street through from 9th Street up to the hill.

Commissioner Smith: Of the three, this is probably the one I don't like the most, simply because I drive that area all the time and it's a real inconvenience.

Commissioner Harden: There is a lot of research that shows when you install STOP signs, you actually speed-up the traffic rather than slow it down.

MOTION BY COMMISSIONER SMITH, SECONDED BY COMMISSIONER WOODS, TO RECOMMEND DENYING THE REQUEST TO ESTABLISH A MULTIWAY STOP AT THE INTERSECTION OF 11TH STREET (EAST LEG) & MISSISSIPPI STREET; THE MOTION FAILED 2-5.

MOTION BY COMMISSIONER HECKLER, SECONDED BY COMMISSIONER MILLER, TO RECOMMEND ESTABLISHING A MULTIWAY STOP AT THE INTERSECTION OF 11TH STREET (EAST LEG) & MISSISSIPPI STREET SUBJECT TO RECONSTRUCTION OF THE PRIVATE DRIVEWAY ON THE WEST LEG OF THE INTERSECTION; THE MOTION WAS APPROVED 5-2.

ITEM NO. 6:

Public Comment:

None.

ITEM NO. 7:

Commission Items:

None.

ITEM NO. 8:

Miscellaneous:

None.

The meeting adjourned at 7:50 P.M. The next scheduled meeting is Monday, June 7, 2010.

Respectfully submitted,

David E. Woosley

Transportation/Traffic Engineer

City of Lawrence
Traffic Safety Commission

April 30, 2010

Dear Commission Members:

Agenda Items No. 3, 4 and 5 to establish Multi-way Stop Signs at three separate City intersection locations are of particular interest to the University of Kansas and the safety of students. Documentation of traffic counts have been shared with University staff, as well as the recommendations for each agenda item. The University understands traffic volume may not meet the required threshold necessary to recommend permanent multi-way stop signs. The University further understands that pedestrian counts are not available for consideration. However, the University strongly recommends that pedestrian safety considerations be given consideration and believes that they outweigh the basis traffic count criteria.

For instance, approximately 575 students currently live in the GSP/Corbin Residence Hall Complex and many walk to and from campus. The safety of these students has been greatly enhanced by the temporary installation of the Stop Signs at 11th and Louisiana Street (Agenda Item No. 3) as well as the Stop Signs at 11th and Indiana (Agenda Item No. 4). In addition, establishing Stop Signs at 11th and Indiana that would permit through east-west through traffic on 11th Street and stop north-south traffic on Indiana Street would significantly benefit bus traffic, particularly in inclement weather. Finally, the multi-way stop at 11th and Mississippi Street (Agenda Item No. 5) has improved traffic flow as well as pedestrian safety. Further, by slowing traffic on Mississippi Street between 9th Street and the traffic booth entrance to the Main Campus, crosswalk safety has been improved, particularly for the sidewalk and stair from the new Oread and 12th Street to Mississippi Street.

While the University understands traffic volume criteria may not warrant multi-way stop signs at the locations references, we recommend that the improved student and pedestrian safety be given overriding consideration to approve the permanent Multi-way Stop Signs at each of these three intersections.

Thank you for your consideration.

Sincerely,



Don Steeples
Senior Vice Provost

cc
Chancellor's Office
Facilities Operations