

Office of the City Manager

Date: June 28, 2010

Agenda Item No. 37

Roll Call No. <u>10-1056</u>

Communication No. 10-381

<u>10-381</u>

Submitted by: Jeb E. Brewer, P.E.

City Engineer

AGENDA HEADING:

Amending Chapter 114 of the Municipal Code regarding traffic regulation changes as follows:

- A. Two-Sided Parking Restriction—200-400 Block of East Kenyon Avenue
- B. Reverse Parking Restriction—50th Street between Madison and Aurora Avenues
- C. Request for Traffic Signals 7th Street and Laurel Street

SYNOPSIS:

Recommend approval of the Traffic Safety Committee recommendations, including first reading of the Ordinance regarding the traffic regulation changes.

FISCAL IMPACT:

Amount: Minor costs for signing modifications.

Funding Source: 2009-2010 Operating Budget, Page 93, Engineering Department Traffic &

Transportation - Sign Installation and Maintenance, ENG100413.

Amount: \$185,000 for 7th & Laurel Street traffic signal, including temporary signal.

Funding Source: \$75,000 State Traffic Safety funds (anticipated)

\$7,500 DMACC (committed)

\$102,500 2011-2012 CIP, Page Street Improvements – 12, City-wide Signals, Channelization and

School Crossing Protection Program, TFC091.

ADDITIONAL INFORMATION:

A. Staff received a neighborhood petition from residents along East Kenyon Avenue requesting that parking be prohibited on the south side of the street between House No. 239 and House No. 414. The primary reason was because of a hillcrest in the street. Parking is currently prohibited on the north side of the street, so the neighborhood request will result in no parking allowed on the street in this area.

A notification letter was sent to each of the directly-affected residents regarding this parking request. An e-mail response was received from the property owner of 242 and 246 E Kenyon Avenue. This property owner was not in favor of removing the parking from in front of his duplexes, fearing the loss of his tenants or the loss of income due to the inability to rent them at the current rate. Based on the majority petition of the directly-affected residents, staff recommended that the proposed parking restriction be approved.

At their June 8, 2010 meeting, the Traffic Safety Committee considered the petition, input from several residents in favor of the petition to remove parking, and the email opposed to removing parking. The Committee approved a motion to restrict parking on both sides of E Kenyon Avenue from 239 East Kenyon Avenue to just east of 337 East Kenyon Avenue. The following revision to the Municipal Code is necessary to place this parking restriction into effect.

Sec. 114-3364. East Kenyon Avenue--South Union Street to Southeast Thirty-second Street.

East Kenyon Avenue, on the south side, from a point 600 feet east of Southeast First Court to a point 725 feet east thereof, no parking any time.

B. Staff received a neighborhood petition from residents along 50th Street, requesting that parking be switched to the east side of the street between Madison Avenue and Aurora Avenue. Parking is currently allowed only on the west side of the street. The Hoover High School athletic field and the City's Northwest Aquatic Center are located along the east side of this block. When non-residents come to those facilities, especially the athletic field and stadium, they often park partially blocking the driveways

A notification letter was sent to each of the directly-affected residents regarding this parking request. Based on the support of the directly-affected residents, staff recommended that the proposed parking restriction be approved.

At their June 8, 2010 meeting, the Traffic Safety Committee made a motion to approved staff's recommendation to reverse the parking from the west side to the east side of 50th Street between Madison Avenue and Aurora Avenue. The motion passed 8:0. The following revisions to the Municipal Code are necessary to place this parking restriction into effect.

Sec. 114-2942. Fiftieth Street--Woodland Avenue to Meredith Drive.

Fiftieth Street, on the east side, from Franklin Avenue to <u>a point 50 feet north of Madison Avenue</u> Aurora Avenue, no parking any time.

Fiftieth Street, on the west side, from Madison Avenue to Aurora Avenue, no parking any time.

Fiftieth Street, on the east side, from a point 290 feet north of Madison Avenue to a point 120 feet north thereof, no parking any time.

Fiftieth Street, on the east side, from a point 490 feet north of Madison Avenue to a point 120 feet north thereof, no parking any time.

Fiftieth Street, on the east side, from Aurora Avenue to a point 50 feet south thereof, no parking any time.

C. Staff has worked with Des Moines Area Community College (DMACC) representatives concerning traffic issues at the intersection of 7th Street and Laurel Street, which is the main entrance to the Des Moines campus of DMACC. Enrollment at the DMACC Urban Campus has increased dramatically, from less than 2,000 students in 1998 to nearly 7,000 students this year, and continues to increase annually. The main entrance and exit for those students is the intersection of 7th & Laurel. In addition, a number of the students commute to the campus on DART buses, which requires them to cross 7th Street as a pedestrian. Several of those students are confined to wheelchairs, so the crossing is particularly difficult for them.

Laurel Street is the first east-west street north of I-235, and provides a major connection to the Mercy Medical Complex as well as the main entrance to DMACC. There is a traffic signal at 6th and Laurel, but the intersection at 7th just has a stop sign for Laurel. Seventh Street splits south of University Avenue to form the southbound one-way street to pair with northbound 6th Avenue. Seventh Street curves just north of Laurel, so sight distance from Laurel to enter or cross 7th Street is limited.

Traffic counts taken in late April of 2010 show about 8,300 vehicles per day (vpd) on 7th Street, with approximately 3,600 vpd on the east leg of Laurel and 1,700 vpd on the west leg, which is the DMACC entrance. The 85th percentile speed on 7th Street approaching the intersection is 31 mph, but due to the curvature of the road on this approach, the vehicles appear to arrive at the intersection very quickly, and it is also somewhat difficult to accurately judge the speed of approaching vehicles. The traffic signal at 6th and Laurel creates queues of vehicles arriving at 7th Street, and during the morning and afternoon peak traffic periods, it is difficult for those vehicles to enter or cross 7th, resulting in considerable delay for these motorists.

Overall, the crash history at this intersection has not been excessive, with a total of 14 crashes during the five-year period 2005-2009. The crash rate is also below average, with a rate of 0.66/MEV (million entering vehicles). Seven of the crashes were right-angle crashes. There were also six left-turning crashes between westbound vehicles on Laurel turning left onto 7th Street and eastbound vehicles from the DMACC drive.

Traffic and Transportation staff completed a traffic signal warrant analysis of this intersection, and found that the traffic volumes and patterns did not fully meet any of the individual signal warrants. Warrant 1 is the primary warrant, which requires minimum traffic volumes on both the major street and the side street for a total of at least eight hours on an average day. Laurel Street meets the minimum side street volume of 150 vehicles per hour for 12 hours, and exceeds that volume by at least 37% for eight hours. Seventh Street meets the minimum major street volume for three of the required hours, but is within 90% of the minimum volume for eight hours.

Based on (1) the combination of traffic volumes well over minimum values on Laurel and at 90% or more on 7th Street, (2) the limited sight distance due to the curving approach on 7th Street, (3) the pattern of crashes at the intersection, (4) the long queues and delays on Laurel, and (5) the need to provide improved pedestrian crossing opportunities, it is recommended that a traffic signal be installed at this intersection. This signal should be interconnected to the signals at 6th and Laurel and at 7th and I-235. In addition, an advance flasher and warning sign should be considered on 7th Street approaching the intersection to alert southbound traffic of this signal, due to the limited sight distance.

At the June 14, 2010 meeting, by Roll Call Number 10-884, the City Council approved a recommendation to submit an application for state safety funds for this proposed traffic signal installation. DMACC has indicated a very strong interest in having at least a temporary signal installed by the start of fall classes, and has agreed to contribute \$7,500 toward the cost of this temporary signal, which is estimated to cost about \$15,000. The permanent signal is estimated to cost approximately \$150,000 and it is expected that 50% of that cost can be provided with State traffic safety funds.

At their June 8, 2010 meeting, the Traffic Safety Committee approved a motion to install a permanent traffic signal at the intersection of 7th Street and Laurel Street, and to further install a temporary signal prior to the beginning of fall classes at DMACC.

The following ordinance change is necessary to implement a traffic signal at this intersection.

Sec. 114-1468.02. Laurel Street.

<u>Laurel Street and Seventh Street, traffic control signal.</u>

PREVIOUS COUNCIL ACTION(S):

<u>Date</u>: June 14, 2010

Roll Call Number: 10-884

Action: Approving FY2012 Traffic Safety Fund Applications to the Iowa Department of Transportation.

(Council Communication No. 10-336) Moved by Hensley to adopt. Motion Carried 7-0.

BOARD/COMMISSION ACTION(S): TRAFFIC SAFETY COMMITTEE

Date: June 8, 2010

Roll Call Number: N/A

<u>Action</u>: Sgt. Jack Beardsley made a motion to restrict parking on the south side of E Kenyon Avenue from 239 E Kenyon Avenue to just east of 337 E Kenyon Avenue. Seconded by Scott Galenbeck. George Robinson was opposed. Motion passed 7:1.

Date: June 8, 2010

Roll Call Number: N/A

<u>Action</u>: Kevin Williamson made a motion to approve staff's recommendation that parking be switched from the west side to the east side of 50th Street between Madison Avenue and Aurora Avenue. Seconded by George Robinson. Motion passed 8:0.

Date: June 8, 2010

Roll Call Number: N/A

<u>Action</u>: George Robinson made a motion to approve staff's recommendation for installation of a permanent traffic signal at the intersection of 7th and Laurel and staff's further recommendation that a temporary signal be installed prior to the beginning of fall classes at DMACC. Seconded by Kevin Williamson.

ANTICIPATED ACTIONS AND FUTURE COMMITMENTS:

Second and third readings of Ordinance.

For more information on this and other agenda items, please call the City Clerk's Office at 515-283-4209 or visit the Clerk's Office on the second floor of City Hall, 400 Robert D. Ray Drive. Council agendas are available to the public at the City Clerk's Office on Thursday afternoon preceding Monday's Council meeting. Citizens can also request to receive meeting notices and agendas by email by calling the Clerk's Office or sending their request via email to cityclerk@dmgov.org.