CITY OF Clyde Hill

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TO: Mayor & Council

FROM: Mitch Wasserman

DATE: August 4, 2016

RE: **STUDY SESSION – CUT THROUGH TRAFFIC POLICY**

BACKGROUND:

One of the advantages of living in Clyde Hill is its location and proximity…the easy distance to Bellevue and Seattle makes just about everything readily available. However, this advantage can also be a problem. The same people going to and from Bellevue/Seattle use Clyde Hill streets, especially on Monday-Friday at PM peak times (4pm to 7pm). The lure and associated problems are centered on the 84th interchange to SR 520.

This is not a new issue. For years the City and its neighbors have complained about and have attempted to make adjustments to city streets in an effort to manage evening cut through traffic. In the 1980's Clyde Hill developed a Transportation Committee to discuss traffic concerns. In 1998 Clyde Hill, Hunts Point Yarrow Point and Medina hired a traffic engineer to study the issue. The consensus at that time was to pursue the idea of restricting access to SR-520 from 84th Avenue in the PM peak periods of the day. The hope was that this would eliminate the lure for any cut-through traffic to go through our communities.

Over the last few decades Clyde Hill has invested in a number of projects to address speeding and cut through traffic. Various traffic calming methods have been used: speed humps on 98th, safety intersection improvements on 24th, flashing stop signs, directed patrolling, defined intersections and reduced lane width on 24th, boulevard w/reduced lane width on 84th, new sidewalks increasing pedestrian safety, speed trailer usage and the 40' truck limit.

Earlier this year Clyde Hill conducted a new traffic study with Medina. The purpose of the study was to understand more about current traffic patterns, suggest ways to manage problems and see if any design changes to proposed work on 24th/84th (north of 24th) could be used to address any of the discovered problems. The final study report was just completed and is attached. Overall, here is what they found:

- Local roads are not a problem when the 520 mainline is flowing
- When the mainline is clogged, Clyde Hill experiences city-wide implications
  - Only M-F, pm peak times (4pm to 7pm)

2016 TRAFFIC STUDY OVERVIEW:

• Prior to study, solicited community input. The online community survey and open house confirmed the initial study purpose and the need to focus on the 84th corridor to manage cut through traffic (p.6)

• 2016 traffic volumes are lower than they were in 2006. Minimal to moderate growth is expected by 2030 (p.8)

• Problem: The longer there is congestion on SR 520, the greater the chance that regional trips will divert onto city streets (p.9)

• Intersection level of service summary: The intersections at these interchange areas can serve the 2030 traffic volumes assuming that SR 520 performs well (p.10)

• Origin-destination study and travel time study – trips that start outside of Clyde Hill and Medina, account for 70% to 80% of the volume during weekday commute peaks (p.11+)

• Bellevue Way is a Push - traffic studies showed that regional travelers have about an even trade-off when considering route choices during heavy congestion on WB SR 520. The extra travel time if they access SR 520 at Bellevue Way, is about 6 minutes during heavy congestion and the extra time on local routes via 84th Avenue is about 5 or 6 minutes. Many regional travelers are facility agnostic, and typically will seek the shortest time path regardless of the route (p.14)

5 Ideas to reduce cut through traffic: (p.14+)

#1 -Reduce peak hour vehicle capacity approaching 84th interchange during weekday pm peak to make it less attractive for regional travelers. The general idea is to extend the travel time along diversion routes as congestion builds on WB SR 520. No preferential treatment is given to local users because the capacity reduction affects all uses (p.14)

Options to consider:

Reduce maximum green time at traffic signals NB on Bellevue Way that are making left-turns toward 84th…primarily at 24th

Reduce the metering rate entering WB SR 520 on-ramp from the general purpose lanes. The HOV bypass lane would be unaffected

All-way flashing red signals at 84th/24th during the weekday PM peak hours. This could be triggered by the time of day, or dynamically with new signals

#2 Strengthen Traffic Calming to increase safety and reduce speeds (p.15)

Options to consider:

Raised pavement crosswalks along with high visibility signage

Radar speed signs…Excessive speeding causes the sign to flash red with the text "SLOW DOWN" to warn drivers to reduce speeds greatly to match the speed limit

#3 Reduce Queue Impacts near Medina Circle and Hawthorne Ct (p.16)

Options to consider:

Post do not block signs and add pavement markings

#4 Wait for completion of 520 improvements (p.17)

Options to consider:

Wait to see the full effects of the 520 construction before making permanent or costly changes

#5 Coordinate w/Bellevue (p.17)

Options to consider:

Communicate to Bellevue commuters that Bellevue Way is a major route to SR 520

Signal timing changes to reduce left turn volume from Bellevue Way onto 24th

Summary & Conclusions: (p.19)

- Local conditions are greatly influenced by the operations of the freeway, when SR 520 is operating normally, the local system works
- Travel times on Bellevue Way tend to remain steady regardless of the freeway
- 70% to 80% of cut through traffic during the weekday pm commute originates in Bellevue

Recommended traffic management solutions:

Educate downtown Bellevue commuters about the benefits of traveling on Bellevue Way. It provides direct access to SR 520 and has a travel time that remains fairly steady regardless of the variation of congestion along westbound SR 520.

Provide a continuous bike facility on 84th. A continuous bicycle facility that extends north would provide safety to bicyclists along the corridor.

Install the latest traffic signal control system at the intersection of 84th/24th to take advantage of the advanced traffic management methods.

Interconnect communications for the new signal with the City of Bellevue's signal system or WSDOT's detector system to adjust the local timing plans, accordingly, with coordination with both agencies. Conduct pilot testing of the selected management plan prior to permanent installation.

COUNCIL STUDY SESSION:

In July, the Council asked the staff to set up a study session to discuss the results of the traffic study and develop a strategy to address the associated cut through and speeding problems. There is a recognition that some of the possible elements of a plan could be done on a more immediate basis while others would need additional funding through the 2017 Budget, so the timing of this discussion (before the budget development) is ideal.

At 6pm on Tuesday August 9th the staff will be prepared to skim over the above traffic study information, share additional traffic management and traffic calming ideas then be available for comment or further assistance. The intent of the brief presentation is to provide the Council with some potential building blocks to consider in its discussion to construct a cut through traffic policy.