



Engineering Department

DATE: September 15, 2020
FROM: Gabe Schell, City Engineer
ITEM: NDDOT HSIP Funding Solicitation

REQUEST

Consider request to pursue NDDOT Highway Safety Improvement Program (HSIP) funding.

Please place this item on the 9/22/2020 City Commission meeting agenda.

BACKGROUND INFORMATION

The North Dakota Department of Transportation (NDDOT) is soliciting local public agencies for safety projects as part of their Highway Safety Improvements Program (HSIP). This solicitation is usually funded at an 80/10/10 split with Federal Safety Funds paying 80%, NDDOT paying 10% and the City of Bismarck paying 10% of the construction costs. These dollars are typically used to address safety issues or reduce crash potential on roadways within a community. HSIP projects previously constructed have included pedestrian countdown heads and blue-light confirmation at signalized intersections and pavement marking improvements to create two-way left turn lanes. Projects programmed and under design development include State Street Safety improvements, rectangular rapid flash beacon upgrades at pedestrian crossings throughout the community, turn lane modifications on Century Ave/4th St & Century Ave/Washington St, intersection improvements to S Washington St/Bismarck Expressway, and roadway lighting to Bismarck Expressway between Main Avenue and Burlington Dr.

Project applications are due on September 30, 2020, to the Bismarck-Mandan Metropolitan Planning Organization (MPO) where they will be ranked and prioritized before sending to the NDDOT for review and potential award.

I recommend pursuing the following projects that would address a safety need in the community.

- Citywide conversion of existing 5-section protective/permissive traffic signal heads to Flashing Yellow Left Turns at approximately nine intersections,
- East Bismarck Expressway Pedestrian/Bicycle facility

5-Section Head Conversion

There are nine intersections in the City of Bismarck that are currently operating 5-section “doghouse” signal heads. This project would convert the existing 5-section protective/permissive traffic signal heads to Flashing Yellow Left Turns. The request for a HSIP project is based on the concern for the safety and continuity of traffic signal equipment. The safety aspect will be achieved through the intuitiveness of operation through better driver understanding reducing crash rates. The city wants to pursue standardizing traffic signal operations.

Locations:

1. Washington St & Denver Ave
2. Tyler Parkway & Burnt Boat Drive
3. Divide Avenue & Schafer St
4. Divide Avenue & College Drive
5. Washington Street & Turnpike Avenue
6. 19th Street & Century Avenue
7. Washington Street & Divide Avenue
8. 26th Street & Divide Avenue
9. Century Avenue & Pinehurst/MDU Resources Access

Bismarck Expressway Pedestrian Facility

There are currently no pedestrian facilities along Bismarck Expressway between 18th Street and 26th Street on this corridor. Pedestrians can be observed on a daily basis utilizing the grassed areas behind the curbs. To improve safety, the City of Bismarck would like to propose a project to install a sidewalk along Bismarck Expressway which would significantly improve safety by reducing the interaction of pedestrians on Bismarck Expressway. The long-term benefits after implementation would be realized through improved accessibility for non-motorized public and safety through a reduction in the potential interaction of pedestrians and motor vehicles.



RECOMMENDED CITY COMMISSION ACTION

Recommend approval of pursuing NDDOT Highway Safety Improvement Program (HSIP) safety projects for:

- Citywide conversion of existing 5-section protective/permissive traffic signal heads to Flashing Yellow Left Turns
- East Bismarck Expressway Pedestrian Improvements

STAFF CONTACT INFORMATION

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