

**TO: Bismarck-Mandan Metropolitan Planning Organization
Technical Advisory Committee**

FROM: Steve Saunders, MPO Transportation Planner

DATE: November 7, 2016

RE: TAC Meeting

There will be a meeting of the Bismarck-Mandan MPO Technical Advisory Committee on **Monday, November 14, 2016, at 10:00 AM**. The meeting will be held in the Training Room of the Bis-Man Transit Building at 3750 E. Rosser Avenue, Bismarck, ND. The agenda is outlined below.

AGENDA

1. Review and possible approval of minutes from October , 2016 meeting
2. Discussion and possible approval of Orthophotography & Contours Project – Jason Krueger (Ayres Associates - (Exhibit A)
3. Discussion and review of 2017-2018 draft UPWP (Work Program) - Steve Saunders
Draft UPWP attached
4. Discussion on Urban Roads - Joey Roberson-Kitzman (Exhibit B)
Link for Urban Roads: <http://arcg.is/2cSLbPh>
5. Update on Mandan Downtown Subarea Study – Rachel Drewlow
6. Update on Bismarck-Mandan Bicycle and Pedestrian Study – Steve Saunders
7. Update and discussion of Bismarck-Mandan School Crossing Safety Study – Peggy Harter (Stantec) – (Exhibit C)
8. NE Morton County Future Land Use Plan update and discussion – Scott Harmstead (SRF) - Progress Report - (Exhibit D)
9. High Crash Locations within the MPO discussion - Joey Roberson-Kitzman (Exhibit E)
Link for Urban High Crash Location: <http://arcg.is/2e1xZ9B>
10. Updates on current transportation projects – All
11. Other Business
12. Adjournment

Next scheduled Technical Advisory Committee meeting is on 12/19/2016. Please call me at 355-1848 with questions.

Any individual requiring special accommodations to allow access or participation at the meeting is asked to notify ADA Coordinator, Bismarck-Mandan MPO, PO Box 5503, Bismarck, ND 58506-5503 or complete and submit the Request for Reasonable Accommodations form at <http://www.bismarcknd.gov/DocumentCenter/View/23201> at least five (5) days prior to the meeting.

PROJECTS UPDATE

Project	% Complete	Contracted Completion Date
2013 ITS Architecture Update	100	12/31/2013
Downtown Bismarck Sub-Area Study	100	2/28/2014
2014 Fringe Area Road Master Plan	100	9/30/2014
2015-2040 Long Range Transportation Plan	100	3/31/2015
I-94 Study (revised thru amendment)	100	6/30/2015
NE Bismarck Sub-Area Study	100	11/30/2015
Burleigh County Land Use Study	100	5/31/2016
Corridor Improvement Study	100	8/31/2016
2016 Orthophotography & Contours	98	12/31/2016
NE Morton County Future Land Use Plan	90	1/31/2017
Bismarck-Mandan School Crossing Safety Study	37	12/22/2017

WEBSITES

Project	Website
North Mandan Sub-Area Study	http://www.bismarcknd.gov/DocumentCenter/View/20799
I-94 Study	http://www.bismarcknd.gov/DocumentCenter/View/22877
Downtown Bismarck Sub-Area Study	http://www.bismarcknd.gov/DocumentCenter/View/20796
2015-2040 Long Range Transportation Plan	http://www.bismarcknd.gov/DocumentCenter/View/22760
2014 Fringe Area Road Master Plan (Burleigh County-Bismarck-Lincoln)	http://www.bismarcknd.gov/DocumentCenter/View/22002
(Morton County-Mandan)	http://www.bismarcknd.gov/DocumentCenter/View/22003
Northeast Bismarck Sub-Area Study	http://www.bismarcknd.gov/DocumentCenter/View/24988
Burleigh County Future Land Use Study	http://www.bismarcknd.gov/DocumentCenter/View/26565
Man.-Bis. Corridor Improvement Study	http://www.bismarcknd.gov/DocumentCenter/View/26602
NE Morton County Future Land Use Plan	http://Mortonfuturelanduse.com
Bis.-Man. School Crossing Safety Study	http://www.bis-mansscs.com/

**BISMARCK-MANDAN METROPOLITAN PLANNING ORGANIZATION
TECHNICAL ADVISORY COMMITTEE
OCTOBER 17, 2016**

The Bismarck-Mandan Metropolitan Planning Organization (MPO) Technical Advisory Committee (TAC) met on October 17, 2016, at 10:00 a.m. in the Bis-Man Transit Building, 3750 East Rosser Avenue. Steve Saunders presided.

Members present were Marcus Hall, Justin Froseth, Chuck Peterson, Michael Johnson, Gabe Schell, Ken Nysether, Natalie Pierce, Carl Hokenstad, and Steve Saunders.

Members absent were Mike Aubol and Roy Rickert.

Others present were Rachel Drewlow, Joey Roberson-Kitzman, and Kim Riepl, all with the Bismarck-Mandan MPO; Fred Rios, Captains Landing Township; Ed Ryen, WSB & Associates; Doug Dilliplane, Houston Engineering; Jennie Krause, KLJ; Mark Berg, Bismarck Engineering; Brian Ritter, BMDA; Scott Harmstead, SRF; Quirin Friese, Hay Creek Township; Mike Hinshaw, SEH; Jason Gullicks, Apex Engineering Group; Jeff Solemsaas, Bismarck Police Department; Richard Duran, FHWA; Dustin Commons, Stanley Consultants; with Jason Krueger of Ayres Associates and Peggy Harter of Stantec participating via telephone.

MINUTES

Chair Saunders called for consideration of the minutes from September 19, 2016.

MOTION: Mr. Hall made a motion to approve the September 19, 2016 minutes. Mr. Hokenstad seconded the motion and with all members present voting in favor, the September 19, 2016 meeting minutes were approved.

URBAN ROADS SCORING/LRTP GOAL WEIGHTING EXERCISE

Ms. Drewlow recalled MPO staff's proposal of a number of changes to the Urban Roads prioritization process brought forward to TAC earlier in 2016, some of which were accepted and some of which were not. She reminded TAC there is now a two-tiered prioritization process. It consists, in the first part, of a prioritization committee which reviews, discusses, and ranks the applications. This has been altered to include a pairwise comparison of the applications, which provides a more objective approach to ranking.

The second part of the prioritization process instituted consists of staff review of the applications based on Long Range Transportation Plan (LRTP) goals in an effort to move toward performance based decision making, using performance measures.

MPO staff requested TAC members' input in weighting the seven LRTP goals. Mr. Roberson-Kitzman indicated Exhibit A in the packet, which provided a list of the seven goals of the LRTP, each with its' own set of objectives, and how they apply. He indicated the scoring sheet which had been handed out to TAC members and explained the process of weighting each goal in its entirety. Lengthy discussion followed, including the feasibility and impacts of scoring

each objective within each goal as compared to scoring the goal as a whole. It was ultimately agreed the method proposed for scoring the goal as a whole was preferred.

Mr. Schell asked when the final weighting would be made available to the jurisdictions and Mr. Roberson-Kitzman replied the results would be tabulated the same day at the end of the TAC meeting so that the weighted averages may be presented to Policy Board the following day.

Mr. Johnson noted NDDOT (North Dakota Department of Transportation) is a non-voting member of the prioritization committee and so will not be providing scores for the weighting of the goals.

Ms. Drewlow alerted TAC members to the impending update of the MTP (Metropolitan Transportation Plan, formerly referred to as the LRTP). She stated with that update, the current prioritization process will again be revised in 2018.

Mr. Johnson asked if anything similar was proposed to be done with the Regional projects and Ms. Drewlow responded there would be no changes at this time as it was her understanding that any changes to the scoring process would have to be done in partnership with District (the District office of the NDDOT). She stated she has not received any such indication from District to do so.

MANDAN DOWNTOWN SUBAREA STUDY

Ms. Drewlow announced the interview committee for the Mandan Downtown Subarea Study met on Thursday, October 13, and interviewed three consulting groups for the study. They were KLJ together with RDG, Crandall-Arambula with WSB, and HDR with Bartlett & West. The outcome of the interviews and the scoring indicated that KLJ was the top consultant. Review of their sealed cost proposal, as it was below the maximum budget of \$250,000, further supported KLJ as the preferred consultant. Ms. Drewlow added MPO staff is seeking TAC approval of KLJ/RDG as the consultant, and further, is requesting authorization to approve the contract once it has been completed and reviewed by NDDOT, the MPO, and legal counsel.

Mr. Schell inquired if the selection was a unanimous or split decision by the committee and Ms. Drewlow disclosed it was close, with KLJ garnering 8 points and Crandall-Arambula 9 points. She explained the lowest number of points indicates the top choice.

Mr. Froseth offered that the City of Mandan is satisfied with the selection of KLJ for this study.

MOTION: Mr. Froseth made a motion to recommend approval of KLJ as the selected consultant for the Mandan Downtown Subarea Study as presented and to give MPO staff authorization to execute the contract. Ms. Pierce seconded the motion and with Marcus Hall, Justin Froseth, Chuck Peterson, Michael Johnson, Gabe Schell, Ken Nysether, Natalie Pierce, Carl Hokenstad, and Steve Saunders voting in favor, the motion was approved.

BISMARCK-MANDAN BICYCLE AND PEDESTRIAN STUDY

Mr. Saunders reported the selection team for this study met Wednesday, October 12. He stated there were four teams that vied for the project: Alta with WSB, Stantec with Bartlett & West, CDG (Community Design Group) and also SRF with Toole Design Group. The selection committee chose the team of Stantec and Bartlett & West as the preferred consultant. He indicated it was not a unanimous selection but was by a clear majority. Mr. Saunders stated

approval of the selected consultant was desired, along with the authorization of MPO staff to begin contract negotiations and to execute the contract once complete.

Mr. Rios, supervisor of Captains Landing Township, stated there is a multi-use trail that runs from the Memorial Bridge to the Grant Marsh Bridge (on the west side of the river) which Captains Landing maintains in the summer. He asked if there was funding available for winter maintenance of the trail, explaining it could be used for cross-country skiing or other items in the winter if it was maintained. Mr. Saunders asked if the trail was owned by Captains Landing Township and Mr. Rios replied it was. Neither Mr. Saunders nor Mr. Johnson was aware of any specific funding mechanisms which might help Mr. Rios.

Mr. Johnson asked if the recommended consultant, Stantec with Bartlett & West, was the same consulting team performing the Bismarck Mandan School Safety Study. Mr. Saunders replied the firms were the same, but the project manager was different.

MOTION: Mr. Schell made a motion to recommend approval of Stantec/Bartlett & West as the selected consultant for the Bismarck-Mandan Pedestrian and Bicycle Study as presented and to give MPO staff authorization to execute the contract. Mr. Hall seconded the motion and with Marcus Hall, Justin Froseth, Chuck Peterson, Michael Johnson, Gabe Schell, Ken Nysether, Natalie Pierce, Carl Hokenstad, and Steve Saunders voting in favor, the motion was approved.

BISMARCK-MANDAN SCHOOL CROSSING SAFETY STUDY

Ms. Harter stated the reporting period for the current progress report was from September 7 to October 6. In that period, 32 of the 33 principal surveys have been received with the remaining principal survey conducted over the phone. The school site observations have been completed at 22 of the schools and Stantec and Bartlett & West have been verifying the data received from ATAC (Advanced Traffic Analysis Center) during the school site visits.

The project website, www.bis-mansscs.com, has been updated with the Final Policies and Procedures Memorandum and the minutes from the second steering committee meeting.

Student tally forms have been completed and received from 26 of the 33 schools and those items are being finalized. Additionally, parent surveys were available from September 12 through September 23 with survey links that were made available through the project website as well as through information sent to the parents by the school districts. The information from those surveys is being processed by the National Safe Routes to School Center.

Other surveys include 15 surveys completed with para-transit and taxi services that make trips to the school sites and surveys for bussing companies and before- and after-school care providers.

The next reporting period will include the completion of on-site school observations and collection of the remaining student tally forms. All of the completed data collections will be compiled into a stand-alone chapter for each school site that will be put into the report. Further, preparations for the open houses, which have been scheduled, will begin. The Bismarck open house will be held on Tuesday, November 29 and the Mandan open house will be held Thursday, December 1. In conclusion, Ms. Harter stated the project schedule and budget are still in line.

Mr. Schell asked where the public open house meetings would be held and Ms. Harter replied both meetings will take place in their respective City Commission Chambers to allow them to be televised. Questions will be accepted using a text enable number shown by Dakota Media Access on the live feed and recording of the meetings. The Bismarck meeting begins at

6:00 pm and ends at 8:00 pm in the Tom Baker Meeting Room and the Mandan meeting begins at 5:30 pm in the Ed “Bosh” Froehlich Meeting Room, lasting until 7:30 pm.

2016 ORTHOPHOTOGRAPHY & CONTOURS PROJECT

Mr. Krueger indicated the overall project was approximately 89% complete and the review of the digital orthoimagery and the topographic mapping is now complete. The review schedule, originally intended to be complete by late September, was extended. There were still a few comments coming in from the various jurisdictions later in the process and Ayres wanted to be certain they had addressed as many of those as possible.

A number of edits have been applied to the orthoimagery data as a result of the comments received as well as to the topographic mapping component. Work is being done to finalize all of the products and everything should be processed and shipped to the MPO at the end of the week.

Additionally, Mr. Krueger stated it was his understanding all the wall maps had been delivered to each of the participating jurisdictions. He asked that any questions or comments regarding the wall map, or requests for extra copies, be directed to him.

NE MORTON COUNTY FUTURE LAND USE PLAN

Mr. Harmstead announced the final public input meeting had taken place on Wednesday, October 12 at Mandan Middle School. He reported good attendance with approximately 26 people there. The preferred future land use plan was presented and there were few comments, which indicates the public and the steering committee are coming to a consensus on the future land use which is a really good thing. Also shown at the meeting were two conceptual maps, one illustrating a Harmon Lake build-out concept and the other illustrating an Interchange area (I-94 and Highway 25) build-out concept. These maps were provided to TAC attendees as handouts. Mr. Harmstead emphasized these are only conceptual and have not been submitted, but there was the desire to show the public what these areas *could* look like with the land uses identified. He presented an overview of the land uses conceptualized in each map.

Mr. Harmstead stated the last steering committee meeting would be held Monday, October 24. The future land use map will be finalized at that meeting and will then be presented to the Morton County Planning & Zoning Commission and the Morton county Commission in November. It is anticipated it will be presented to TAC and Policy Board for final adoption in November, approximately one month ahead of schedule.

CONSOLIDATED PLANNING GRANT (CPG) FUNDING

Mr. Johnson began by explaining the money the MPO receives from NDDOT and the federal partners (Federal Highway Administration-FHWA, and Federal Transit Administration-FTA), for all the MPOs’ operations and studies is combined into one consolidated planning grant (CPG). The items that make up that grant are Federal Highway Funds, called Planning Funds or PL Funds, and also Federal Transit Funds, such as 5303, 5304, or Statewide Metropolitan Transportation Planning Funds. The funds are administered to the three state MPOs by NDDOT through the CPG.

He stated there are currently two Consolidated Planning grants open, the Fiscal Year (FY) 2015 and the FY2016. He detailed the balances for both grants for all three MPOs, indicating Grand Forks MPO has a zero balance left in their 2015 grant and has been spending on their 2016 grant since April, while neither Bismarck nor Fargo have touched the money in their 2016 grants. He provided the approximate monthly spending averages for each MPO,

noting the Grand Forks monthly average appears to be slightly higher. He explained this is likely due, in part, to the fact that Grand Forks has received approximately \$300,000 from the Fargo MPO within the last 18 months and so is doing more studies now than is typical for them. Additionally, he recalled the Bismarck MPO giving money to Grand Forks several years ago, to help reduce those old balances. Effectively, the Grand Forks MPO has received about \$600,000 over the past six years for planning work from the other two MPOs.

Mr. Johnson presented the current CPG expending timelines for the MPOs. It is likely, given the current balances and the rate at which each MPO is spending them down, the Grand Forks MPO will run out of money by January 2017, while Bismarck will have enough between the 2015 and 2016 grants to carry them through January 2018 and Fargo will have enough to potentially last to July 2019.

Mr. Johnson then presented the following funding options:

- Fund transfer between MPOs as has been done in the past (short term fix)
 - BMMPO and FMCOG have approximately \$940,000 in 2015 Grant
 - BMMPO and FMCOG have additional \$2,177,476 in 2016 Grant
 - Fund transfer can be voluntary by the MPOs
 - Fund Transfer can be coordinated by NDDOT
- Formula Change (long term solution)
 - Current formula – the money is divided out to each MPO using a formula derived from a base amount and the remainder apportioned according to population
 - Historically the MPOs have cooperatively developed the formula, NDDOT approves it
- Separate PL Distribution using the funds from the 2014 Grant which was de-obligated, providing the obligational authority is available to spend it

Mr. Johnson then presented formula change scenarios for discussion. The formula change scenarios included different base amount increases and the impacts to each MPO resulting from each. He also presented a scenario for equal distribution amongst the MPOs such as \$501,608. Additionally, he presented the possibility of Minot becoming an MPO based on 2020 Census figures which would present further modifications to the scenarios.

There are two reasons this funding situation must be examined before Minot becomes an MPO:

- 1.) This is a recurring issue which happens every year
- 2.) When there is a balance transfer to Grand Forks, their workload becomes very heavy, essentially taking their workload and doubling it over a calendar year, as they must spend that money right away

Another option Mr. Johnson presented is to increase the base amount for Grand Forks by \$100,000 while Bismarck MPO and Fargo MPO base amounts remain the same.

Mr. Froseth asked about simply loaning the money to Grand Forks and Mr. Johnson explained the difficulties involved with it and why NDDOT will not consider that option.

Mr. Froseth asked if there is a mechanism of turning planning allocations to actually putting the funds toward projects and Mr. Johnson replied no, the federal PL funds are only for planning.

Mr. Hall inquired as to the appropriateness of Grand Forks' spending, and Mr. Johnson explained each MPO expends nearly half their yearly budgets on operating costs, leaving the

other half for studies. He further explained that those spending levels only leave Grand Forks approximately \$250,000 for studies, and they have reduced their not to exceed budgets on their studies.

Mr. Saunders explained Bismarck-Mandan MPO staff has discussed this with NDDOT and with Fargo Metro COG. He favored using the 2014 CPG funds to augment Grand Forks for the following reasons:

- To allow an evaluation period before making any changes to the formula
- The formula has only been changed one time in the last 18 years
- Avoid overcompensating Grand Forks unnecessarily
- Since the de-obligation of the 2014 Grant, Bismarck-Mandan MPO is probably about where they should be in terms of available funding

Mr. Saunders then proposed using the 2014 CPG funds in the following manner: Grand Forks would receive \$100,000 for two years, with an additional \$100,000 provided to give them the cushion of a rolling balance. Mr. Saunders stated his intention to present this option to the Policy Board.

Mr. Hall inquired as to the process of accessing the de-obligated 2014 funds. Mr. Johnson presented the process and examples of situations to access the funds. Mr. Hall agreed with Mr. Saunders that there should be no formula change at this time, but that there should be an attempt to access the 2014 funds as proposed.

Ms. Drewlow referenced Grand Forks having to quickly spend the infusions of money received from the other MPOs in the past and asked if that would be the same situation with receiving the 2014 CPG funds. Mr. Johnson stated it could potentially be the same situation but he was unsure and would have to check with Federal Highway.

Mr. Nysether observed the need to spend the money immediately may not be too bad of a situation considering their operating costs of \$250,000 leaves them with a shortfall for studies and the infusion of money would allow them to take on another study or two. Mr. Johnson replied that was true to an extent, but he explained the hardship lies within the timeline involved.

ORIGIN/DESTINATION DATA for TRANSPORTATION DEMAND MODEL UPDATE

Ms. Drewlow reported the RFP for the OD (Origin/Destination) data is in development. Permission has been received from NDDOT to use the 2014 CPG funding for this project. What that means is that none of the MPOs will have to use their current CPG funding to pay for this additional request. She further stated all three MPOs are in agreement of using the 2014 funds.

2017-2018 UNIFIED PLANNING WORK PROGRAM UPDATE

Mr. Saunders referred to Exhibit E stating it depicts the studies planned for 2017 and 2018. He noted there are some that are staged between a couple years. He noted the list contains fewer studies than any budget within many recent years. He briefly read through the list on the first page, noting the total amounts in the third column indicate the estimate that each jurisdiction would pay in each year for studies.

He stated a new transit study (Transit Development Plan), shown on page 2, would be developed in 2017-2018, with the total amount of \$140,000 split evenly between the 2 years.

The third page indicates the total amount each jurisdiction contributes to the budget in each year, which typically mirrors the amounts on the first page, with the exception of Bismarck as they provide all match for operating expenses beyond studies.

He concluded by saying the studies budget is very constrained, as evidenced by the short list of studies being presented. He further added that if CPG funding is impacted in the future, that will cause further strain to the list of projects, as well.

Mr. Hall noted the Burleigh County local match on the third page was incorrect. Mr. Saunders agreed it was an error and would be changed.

2016 FUNCTIONALLY CLASSIFIED ROAD SYSTEM UPDATE

Mr. Roberson-Kitzman reported the Functionally Classified Map has, through the update, undergone 88 changes, 87 of which are represented on the list in Exhibit F, with one being presented today. The last additional change came at the suggestion of NDDOT and is the extended inclusion of I-94 both east of Bismarck and west of Mandan to meet the extension of the UZA. The extension is approximately ½ mile total. He then explained the handout distributed provides the corrected percentage calculations for the types of roadways within the functional classification as the original in the packet included a mathematical error.

Mr. Saunders asked if the map was currently going through the processes of NDDOT and Mr. Roberson-Kitzman indicated his understanding that it was, for the most part, complete. Mr. Johnson confirmed, saying NDDOT has signed the letter which should go to Federal Highway the same week.

2016 TRANSPORTATION PROJECTS UPDATES

Mr. Froseth reported the Old Red Trail project in northwest Mandan has fallen behind. The mainline concrete pour is complete and asphalt tie-ins to the concrete on the avenues and on the west side must be done. A large change order for the southeast side of the concrete was recently approved and there is still landscaping and trails to put in. The ADA ramps along Main Street are complete, along with the traffic signals installation on Memorial Highway.

Mr. Schell announced there would be a ribbon cutting ceremony Tuesday at 11:00 am for the Washington Street project, and invited everyone to attend. He disclosed the actual completion date for the project is still November 15 and the project is going well.

OTHER BUSINESS

Policy Board Meeting

Mr. Saunders stated the Policy Board meeting would take place Tuesday, October 18 at 1:00 pm in the Mandan City Hall Commission Chambers.

LRTP/Goal Weighting

Ms. Drewlow stated two members of the TAC were not present to provide their votes for the exercise. She anticipated getting those later in the day and said the MPO would send out notifications to TAC members Tuesday morning with the averages. She further stated she hoped to have them approved by Policy Board so that the engineers know what those numbers are before they get too far into the applications.

LRSP Webinar

Ms. Drewlow shared information on a webinar hosted by NDDOT on the Local Roads Safety Program (LRSP). She stated the webinar takes place on Tuesday, October 25 at 2:30 pm and MPO staff will join the webinar in the Blackstead Room (2nd Floor, City/County Building) and she invited anyone who would like to attend to do so.

Military Plaques

Mr. Rios observed the Liberty Memorial Bridge has beautiful parks on both the east and west sides of it and shared his desire to place plaques of the military organizations of North Dakota on both sides. He questioned how to proceed and it was suggested he contact the parks and recreation districts for Mandan and for Bismarck.

ADJOURNMENT

There being no further business, Mr. Saunders declared the meeting adjourned at 11:32 a.m., with the next scheduled meeting to take place on November 14, 2016, at 10:00 a.m.

Respectfully Submitted,

Kim Riepl
Recording Secretary

APPROVED:

Steve Saunders, Chair

MEMORANDUM

To: Steve Saunders, MPO Planning Division

From: Jason Krueger, Manager - Ayres Associates

Date: November 1, 2016 Project No.: 72-0142.00

Re: Progress Report for MPO LiDAR and Imagery Project (October 2016)

Mr. Saunders,

Ayres Associates is excited for the opportunity to provide the MPO with LiDAR and aerial imaging services again in 2016. Aerial missions are to be conducted in the spring of 2016, leaf-off state, to support the development of 1-foot interval contour topographic mapping and 5-inch resolution digital orthoimagery. This progress report summarizes our overall activities performed to-date along with anticipated schedules and overview of all deliverable products:

Project Status

Contracted Fees:	\$185,000.00
Contract Execution Date:	January 28, 2016
Overall % complete as of <u>Nov 1, 2016</u> :	98%
Services performed to-date:	Project management Flight and survey control planning Control targeting and photo-id survey Aerial imagery and Lidar Acquisition Processing imagery and Lidar pilot areas Aero-triangulation

Project Schedule

Ground control survey (weather dependent):	April 2016 (COMPLETED: April 26, 2016)
Aerial imagery & LiDAR flights (weather dependent):	April 2016 (COMPLETED: March 27-28, 2016)
Pilot ortho and Lidar tiles:	July 15, 2016 (COMPLETED: July 25, 2016)
Orthoimagery GeoTIFF tiles:	September 1, 2016 (COMPLETED: Sept 1, 2016)
OWNER review period:	September 1-21, 2016 (Ortho review COMPLETED: Sept 30. LiDAR Review pending completion on Oct 7, 2016)
Final product delivery:	October 15, 2016 (COMPLETED: Oct 21, 2016)
Project Completion:	October 31, 2016 (PENDING MPO APPROVAL)

General progress notes

The aerial imagery and Lidar collection missions were successfully completed over successive days on March 27 and 28, 2016. The raw aerial imagery and Lidar have been thoroughly reviewed and passed our quality control process. The pilot area delivery was completed by July 15. A few issues concerning software viewing properties were addressed and MPO confirmed acceptance of the pilot deliverables on July 25.

The preliminary products for the orthoimagery and LiDAR topographic mapping were delivered to the MPO on September 1, 2016. This includes the orthoimagery tiles (GeoTIFF and MrSID format) and corresponding LiDAR data files (contours, elevation models, breaklines, spot elevations, and .las format LiDAR point clouds). The remaining deliverables (mosaics, wallmaps, and metadata) will be prepared once any MPO corrections are applied, along with a complete redelivery of all products.

The edited orthoimagery and topographic mapping products were delivered to the MPO on Oct 21, 2016. This includes a redelivery of all data along with finalized ortho mosaics, project-wide contour geodatabase, digital

elevation models, and project metadata. We will await confirmation from the MPO that all products have been review and accepted to confirm project completion and submit final invoice.

Summary of contract deliverables

1. Orthoimagery deliverables include:

- Uncompressed, 5-inch GeoTIFF ortho tiles
- Compressed, 5-inch MrSID ortho tiles
- Project-wide mosaic (5-inch)
- East of Missouri River mosaic
- West of Missouri River mosaic
- Wallmaps: City of Bismarck/Bismarck Mandan MPO (Shared), City of Lincoln, City of Mandan, Burleigh County, and Morton County.

2. Topographic deliverables include:

- Classified Lidar point cloud
- Project-wide 1-foot contours
- Hydro-enforced breaklines
- Digital elevation model
- Spot Elevations
- Terrain geodatabase.
- Topographic Change Detection Model
- Topographic Change Detection Contours

3. Control survey deliverables include:

- New GPS survey monuments in ESRI geodatabase format.
- Coordinates and locations of targeted control in ESRI geodatabase format.
- Survey report for ground control.

4. Metadata deliverables include:

- Metadata compliant with the FGDC's Data Content and Process Standards

Please feel free to contact me at any point with question about our progress.

Thank you,



Jason Krueger, CP, GISP
Manager – Aerial Mapping Group, Geospatial Division

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Projects	2012	2013	2014	2015	2016	2017	2018	2019	2020	Total	Percentage of projects
Bismarck											
Intersection of Washington to Lasalle			\$ 192,000.00							\$ 192,000.00	0.91%
Washington St (Calgary to 43rd)				\$ 10,000,000.00						\$ 10,000,000.00	47.20%
Traffic signal Bismarck	\$ 256,000.00				\$ 256,000.00					\$ 512,000.00	2.42%
Century Ave & Centennial Road	\$ 3,200,000.00									\$ 3,200,000.00	15.10%
Divide Ave (Volk Dr to Expressway)		\$ 7,283,700.00								\$ 7,283,700.00	34.38%
Bismarck Total	\$ 3,456,000.00	\$ 7,283,700.00	\$ 192,000.00	\$ 10,000,000.00	\$ 256,000.00	\$ -	\$ -	\$ -	\$ -	\$ 21,187,700.00	100.00%
Burleigh County											
Centennial & 43rd Ave Signal			\$ 320,000.00							\$ 320,000.00	7.16%
66th St & Highway 10							\$ 660,000.00			\$ 660,000.00	14.78%
Washington (57th-71st)								\$ 3,487,000.00		\$ 3,487,000.00	78.06%
Burleigh County Total	\$ -	\$ -	\$ 320,000.00	\$ -	\$ -	\$ -	\$ 660,000.00	\$ 3,487,000.00	\$ -	\$ 4,467,000.00	100.00%
Mandan											
9th Ave (4th to Main)			\$ 161,860.00							\$ 161,860.00	2.80%
40th Ave SE (Mem Hwy-S Bay Dr)			\$ 283,255.00							\$ 283,255.00	4.89%
24th & Lonspur Dr SE			\$ 283,255.00							\$ 283,255.00	4.89%
Old Red Trail (Highland to 47th)					\$ 3,200,000.00					\$ 3,200,000.00	55.27%
27th St (1806-8th Ave NW)									\$ 1,052,090.00	\$ 1,052,090.00	18.17%
Mckenzie Dr (WB Ramp-46th Ave)			\$ 728,370.00		\$ 3,200,000.00	\$ 809,300.00				\$ 809,300.00	13.98%
Mandan Total	\$ -	\$ -	\$ 728,370.00	\$ -	\$ 3,200,000.00	\$ 809,300.00	\$ -	\$ -	\$ 1,052,090.00	\$ 5,789,760.00	100.00%
Total										\$ 31,444,460.00	

Urban Funding Percentage By Jurisdiction

Jurisdiction	Percentage
Bismarck	67%
Burleigh County	14%
Mandan	19%



To: Rachel Drewlow
Bismarck-Mandan MPO

From: Peggy Harter
Stantec Consulting Services Inc.

File: 193803607
Date: October 31, 2016

**Reference: Progress Report No. 05 – Bismarck-Mandan MPO – School Safety Crossing Study
Monthly Progress Report**

Progress Reporting Period October 7, 2016 to October 31, 2016

Task	Milestone Date	Date Completed	% Completed
Project Initiation			
Contract Execution with Stantec/MPO	June 2016	June 6, 2016	100%
Contract Execution with Stantec/B&W	June 2016	June 29, 2016	100%
Kick-off Meeting with MPO Staff	June 2016	June 20, 2016	100%
Task 1: Data Acquisition & Mapping			
1.1 Document review and follow-up	July 2016	Sept 7, 2016	100%
1.2 Initial mapping of each school	August 2016		60%
1.3 Interviews	August 2016	October 31, 2016	100%
1.4 Student travel tally sheets	October 2016		85%
1.5 ATAC Data Collection	August 2016	August 11, 2016	100%
Task 2: School Yard Observations & Walk Audits			
2.1 School yard/facilities observations	October 2016		100%
2.2 School facility and operation summary report	November 2016		5%
2.3 Walk audits	October 2016		100%
2.4 Walk audits summary report	November 2016		5%
Task 3: Policies & Practices			
3.1 Policies and practice research	August 2016	Sept 23, 2016	100%
3.2 Summary report	September 2016	Sept 23, 2016	100%
Task 4: Infrastructure			
4.1 Infrastructure review and analysis	November 2016		
4.2 Infrastructure alternatives	December 2016		
4.3 Project prioritization and recommendations	January 2017		
Task 5: Non-Infrastructure Project Prioritization			
5.1 Identify issues and alternatives	December 2016		
5.2 Project prioritization and recommendations	January 2017		
Task 6: Draft and Final Report			
6.1 Document Draft	March 2017		
6.2 Document Review	May 2017		
6.3 Final Document	June 2017		
6.4 Final Document Presentation & Approvals	October 2017		
Task 7: Community Engagement and Outreach			
7.1 Community Meetings	October 2016		20%
7.2 Online Engagement	Continuous		
Task 8: Plan Project Admin & SC Meetings			
Steering Committee #1 – Kick-off	July 2016	July 28, 2016	100%
Steering Committee #2 – Material Review for School Observations and Community Meetings	August 2016	August 30, 2016	100%
Steering Committee #3 – Existing Conditions	October 2016		5%
Steering Committee #4 – Alternative Review	February 2017		
Steering Committee #5 – Draft Report	April 2017		
Steering Committee #6 – Final Report	July 2017		
Total Project	December 2017		37.0%

Reference: Progress Report No. 05 – Bismarck-Mandan MPO – School Safety Crossing Study Monthly Progress Report**Activities Completed this Reporting Period (October 7, 2016 to October 31, 2016):**

- Principal surveys completed – received 32 of 33 school sites.
- Stantec and Bartlett & West completed verifying ATAC's GIS data during school site visits.
- Stantec and Bartlett & West have completed the school site observations at 33 school sites. On site observers are recommending that only one school site will need a follow up evaluation in the spring due to road construction impacts. Red Trail Elementary School in Mandan was determined to be impacted from normal operations due to the adjacent construction on Old Red Trail.
- The study has scheduled two public open houses and have been scheduled as follows:

<p>Bismarck/Lincoln Public School District Tuesday, November 29, 2016 6:00 – 8:00 PM Presentation at 6:30 PM Bismarck City/County Building Tom Baker Meeting Rm 221 N 5th Street Bismarck, ND</p>	<p>Mandan Public School District Thursday, December 1, 2016 5:30 – 7:30 PM Presentation at 6:00 PM Mandan City Hall Ed “Bosch” Froehlich Meeting Rm 205 2nd Avenue NW Mandan, ND</p>
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- Stantec and the MPO have been preparing for the upcoming public input meeting. Means of advertising the public input meeting include the following:
 1. Newspaper Advertisements
 2. Dakota Media Access notification on the public access channel
 3. Project Website update to include meeting notification at www.bis-mansscs.com
 4. Email notification sent out to all parents from the school districts
 5. School District bulletin advertisements and e-newsletters
 6. Notification on School District Websites
 7. Notification on the MPO Facebook page
 8. Direct e-mail notification to the Steering Committee members

The meeting will be available to those who cannot physically attend in person as the presentation will be aired live on the Government Access Channel (Channel 2 or HD Channel 602) and <http://dakotamediaaccess.org/ch-2-home/>. During this time, the public can text in their questions or comments about the study to (701) 595-0211. All questions and comments texted in will be recorded as input and will be responded to after the meeting.

- The public meeting will include the purpose of the study, existing conditions and issues at each school site and types of improvements that may result from the study.
- Stantec has continued to update the project website with notification of the upcoming public open house. The project website is www.bis-mansscs.com

Reference: Progress Report No. 05 – Bismarck-Mandan MPO – School Safety Crossing Study Monthly Progress Report

- Student tally forms completed at 32 out of the 33 school sites to inform the study on the mode of transportation for how students are arriving and departing school.
- The online parent surveys were completed for all schools. Results have been collected from the National Safe Routes to School website for each school.
- All paratransit, taxi, bus company and before/after school care provider surveys have been completed.
- Stantec reached out to Bismarck and Mandan Parks to request their input into the study. Mandan Parks completed a review and input for each school site. Bismarck Parks will have representation at all future Steering Committee meetings.
- Stantec has continued to update project maps as data is received from surveys and on site school observations.
- Stantec has been working on preparing the existing conditions/issues chapter for each school site that includes text and project maps. The information in this existing conditions/issues chapter represents all of the surveys and data collection completed to date.

Planned Activities for the Next Reporting Period (November 1, 2016 through December 8, 2016):

- Stantec and the MPO will continue preparing the meeting ads and material to be presented at the public input meetings.
- Stantec will complete the update of the project maps and existing conditions and issues chapters for each school site.
- Stantec will hold the public input meetings for both the Mandan School Districts and the Bismarck/Lincoln School Districts included within the study.
- Stantec will schedule and prepare for SC Meeting #3 to be held after the first round of public input meetings sometime in December 2016. This meeting will be split into two meetings – one for Bismarck/Lincoln Schools and one for Mandan Schools. The reason for splitting this into two meetings is to allow time at the meeting to fully review the details for the existing conditions and issues at each school site.
- Stantec will develop a summation of meeting for both public open houses.

Project Schedule

- All project tasks are currently on schedule.

Project Budget

- All project tasks and expenditures are currently tracking in line with the contracted budget.

Special Considerations

- None at this time

SRF Project Number	9126
PROGRESS REPORT NO.	10
DATE	November 1, 2016



PROGRESS REPORT

Consulting Group, Inc.

REPORTING PERIOD	Report for period from October 1, 2016 through October 31, 2016
PROJECT NAME	Northeast Morton County Future Land Use Plan
PREPARED BY	Scott Harmstead, SRF
PREPARED FOR	Steve Saunders, Bismarck-Mandan Metropolitan Planning Organization

TASK PROGRESS

TASK 1.0	STATUS
Project Management	
Hold bi-weekly meeting with Steve Saunders and Natalie Pierce	Complete

TASK 2.0	STATUS
Land Suitability Analysis	
Gather Morton County and MPO GIS mapping data	Complete
Population, Housing, and Employment Projections	Complete
Existing Land Use Map	Complete
Opportunity and constraint mapping – including existing development, coulee/drainages, wetlands, valuable farmland, rural water lines, existing and future transportation corridors, existing gas and oil transmission lines.	Complete
Review planning and zoning applications	Complete
Land Use Suitability Analysis Document – Final completed from Steering Committee comment	Complete

TASK 3.0	STATUS
Zoning District Refinement	
Created draft visual simulations of hypothetical development scenarios	Complete
Prepared draft zoning district language	Complete
Graphics to accompany zoning district concepts	Complete
Revised draft zoning district language based on public input and county staff review	90%

TASK 4.0	STATUS
Land Use Plan Development	
Stakeholder Interviews – met with City of Mandan staff, rural water, Mor-Gran-Sou, Army Corps, Water Resource District, Ft. Lincoln State Park, Soil Conservation District, Lower Heart River Water Resource District	Complete
Focus Area boundaries formed	Complete
Alternative future land use maps formed (3 alternatives, including Focus Areas)	Complete
Memo in support of alternative future land use maps	Complete
Preferred future land use map	Complete
Enhanced review of Harmon Lake & interchange area – detailed graphics	Complete
Document containing final plan products (plan map, proposed zoning districts, plan implementation, land use suitability analysis, and plan development process)	75%

TASK 5.0 Steering Committee and Public Involvement	STATUS
Project Website	Complete
Public Involvement Plan	Complete
Steering Committee assembled	Complete
Steering Committee Meeting #1	Complete
Public Meeting #1	Complete
County Commission Newsletter #1	Complete
Steering Committee Meeting #2	Complete
Public Meeting #2	Complete
Steering Committee Meeting #3	Complete
Public Meeting #3	Complete
Steering Committee Meeting #4	Complete
County Commission Newsletter #2	Complete
Final Public Meeting (#4)	Complete

PROJECT STATUS – ALL TASKS	STATUS
<i>Total Percent Completed</i>	<i>90%</i>

Upcoming Activities (November 2016)
<ul style="list-style-type: none"> • Respond to comments from MPO, County, NDDOT, and FHWA regarding the final plan document • Prepare for and present plan at Morton County Planning and Zoning Commission hearing • Prepare for and present plan at Morton County Commission hearing

Prepared by the North Dakota Department of Transportation
 Programming Division, Traffic Operations Section, 2016
 Sorted By Rank

2013-2015 Urban High Crash Locations

23 USC § 409 Documents
 NDDOT Reserves All Objections

City	Location	Crash Severity					Total By Year	Total Crashes	Weighted Total Crashes	Rank 2013-2015	Prior Rank	Trends	Related Projects/Recommendations
		Fatal	InjA	InjB	InjC	PDO							
Bismarck	State St & Interstate Ave	0	0	4	31	77	2013 = 37 2014 = 33 2015 = 42	112	307	1	7	There were 22 angle crashes; 68 rear ends (40 NB and 19 SB), 5 left turns, and 7 sideswipe same direction. 38% of crashes occurred during ice/snow surface conditions.	The City of Bismarck based on the LRSP has proposed confirmation lights and countdown timers in 2018.
Bismarck	State St & Century Ave	0	0	3	33	76	2013 = 28 2014 = 42 2015 = 42	112	307	1	5	There were 14 angle crashes; 55 rear ends; 23 left turn (9 EB to NB and 8 WB to SB), and 11 sideswipe same direction. 31% of crashes occurred during ice/snow surface conditions.	The City of Bismarck based on the LRSP has proposed countdown timers in 2018.
Fargo	13th Ave S & 36th St / 1-29 NB Ramps	0	1	7	21	62	2013 = 29 2014 = 33 2015 = 29	91	294	3	11	There were 28 NB rear-end crashes; but only 8 and 6 in the last two years respectively. There were 20 WB rear-end crashes, with 5 between 5:09pm and 5:36pm. There were 12 NB+WB angle crashes, with 4 between 5:45pm and 6:09pm and with 5 of 12 during dark conditions. There were 10 NB+EB angle crashes.	City will be tying city signal system fiber optic cable into the NDDOT's cabinet so that the controllers will be running off the same clock.
Williston	2nd Ave W & 26th St W	0	1	6	14	105	2013 = 36 2014 = 51 2015 = 39	126	284	4	4	There were 10 angle, 76 rear end, and 24 sideswipe same directions crashes. 20% of crashes occur with ice/snow roadway surface conditions. 22% of crashes occur during the 11am to 12:59pm time of day.	The LRSP has proposed confirmation lights for this intersection. In 2016, NDDOT is scheduled to replace the existing southbound free right turn lane with a south bound Signalized Main Line Right Turn Lane, PCN 21178.
Minot	Broadway & 20th Ave SW	0	2	1	16	56	2013 = 24 2014 = 30 2015 = 21	75	221	5	14	There were 20 angle, 32 rear end, and 16 left turn crashes. 21% of crashes occurred with wet roadway conditions and 21% of crashes occurred with ice/snow roadway surface conditions.	The LRSP has proposed confirmation lights, advance walk, and countdown timers for this intersection. Safety project in 2018 will install confirmation lights and modify access. Broadway signals were coordinated in 2016.
Fargo	13th Ave S & 42nd St	0	0	2	22	60	2013 = 34 2014 = 23 2015 = 27	84	214	6	1	There were 24 WB rear end crashes, with 7 between 4:35pm and 5:30pm. There were 23 EB rear end crashes, with 6 between 2:00pm and 2:37pm.	The LRSP has proposed confirmation lights and countdown timers for this intersection. City staff will be proposing full street reconstruction on 13th Avenue S between 38th Street and 44th Street in 2016, which will include a road section 6 through lanes throughout the corridor.
Bismarck	Bismarck Expwy & 9th St / University Dr	0	2	2	12	58	2013 = 21 2014 = 26 2015 = 27	74	210	7	30	There were 10 angle, 40 rear end (19 EB and 17 WB), and 14 sideswipe same direction crashes. 35% of crashes occur during the 3pm to 5:59 pm time of day.	Flashing yellow arrows and countdown timers were installed in 2016.
Bismarck	State St & Capitol Ave	0	0	7	14	47	2013 = 21 2014 = 25 2015 = 22	68	208	8	8	There were 20 angle crashes, 38 rear ends (24 NB), and 5 left turn crashes. 18% of crashes occur from 5pm to 5:59pm.	The City of Bismarck based on the LRSP has proposed confirmation lights and countdown timers in 2018.

2013-2015 Urban High Crash Locations

23 USC § 409 Documents
 NDDOT Reserves All Objections

City	Location	Crash Severity					Total By Year	Total Crashes	Weighted Total Crashes	Rank 2013-2015	Prior Rank	Trends	Related Projects/Recommendations
		Fatal	InjA	InjB	InjC	PDO							
Fargo	13th Ave S & 25th St	0	1	3	18	33	2013 = 18 2014 = 18 2015 = 19	55	203	9	6	There were 14 EB rear end crashes, with 7 during non-dry conditions and with 5 of 14 between 5:30pm and 5:55pm. There were 2 bicycle crashes and both involved vehicles attempting to make right turns and hitting a bicyclist travelling the same direction as the vehicle (prior to turning), 1 NB and 1 SB.	The LRSP has proposed confirmation lights and countdown timers for this intersection. City implemented east/west flashing left turn arrows at this location in 2014 and countdown timers in 2015.
Bismarck	Main Ave & 9th St	0	0	7	13	44	2013 = 15 2014 = 24 2015 = 25	64	199	10	38	There were 30 angle(NB+EB), 20 rear end(10 NB), and 8 sideswipe same direction crashes.	N/A
Fargo	13th Ave S & 45th St	0	0	3	17	59	2013 = 32 2014 = 22 2015 = 25	79	194	11	19	There were 45 rear end crashes (19 WB, 12 NB, 9 EB, 5 SB), with 18 during non-dry conditions.	The LRSP has proposed confirmation lights and countdown timers for this intersection.
Fargo	Main Ave & University Dr	0	2	2	10	53	2013 = 23 2014 = 24 2015 = 20	67	193	12	12	There were 16 EB rear end crashes, with 7 between 4:03pm and 5:43pm and with 8 of 16 during ice/snow conditions. There were 8 SB+WB angle crashes, with only 2 and 1 in the last two years respectively (5 during ice/snow conditions). There were 2 pedestrian crashes in 2014 where a vehicle attempted to make a SB to EB left turn on green and hit a NB pedestrian in the crosswalk.	The LRSP has proposed advanced walk and countdown timers for this intersection. City will review traffic signal timing plans and work on improvements.
Grand Forks	32nd Ave S & 34th St	0	1	2	18	33	2013 = 20 2014 = 12 2015 = 22	54	192	13	16	There were 22 left turn crashes (11 involved EB to NB left turners and 11 involved WB to SB left turners). There were 11 EB/WB rear end crashes. There were 2 ped/bike crashes: one involved a vehicle that attempted to make an EB to SB right turn on red and was hit by a NB bicyclist in crosswalk, the other involved an EB vehicle that entered intersection on green and was hit by a NB skateboarder (skateboarder had red light).	The LRSP has proposed confirmation lights and advance walk for this intersection. Advanced warning signs for "stopped traffic" were installed in 2013. Countdown timers will be installed in 2017, PCN 21002. A Road Safety Review was conducted in 2016 with plans to re-align EB/WB left turn lanes.
Grand Forks	Washington St & Demers Ave	0	1	3	14	44	2013 = 23 2014 = 17 2015 = 22	62	190	14	2	There were 31 rear end crashes (14 SB, 7 NB, 6 EB, 4 WB) with 15 of 31 during non-dry conditions. There were 9 NB to WB left turn crashes, with 5 during non-dry conditions and with 3 of 9 between 6:09pm and 6:27pm. There were 6 SB to EB left turn crashes, with 3 during non-dry conditions.	The LRSP has proposed confirmation lights and advance walk for this intersection. The city recommends installing advanced warnings for north and southbound traffic advising drivers of stopped traffic and congestion at the intersection.

2013-2015 Urban High Crash Locations

23 USC § 409 Documents
 NDDOT Reserves All Objections

City	Location	Crash Severity					Total By Year	Total Crashes	Weighted Total Crashes	Rank 2013-2015	Prior Rank	Trends	Related Projects/Recommendations
		Fatal	InjA	InjB	InjC	PDO							
Bismarck	Bismarck Expwy & 3rd St	0	1	4	11	50	2013 = 21 2014 = 19 2015 = 26	66	189	15	25	There were 41 rear end (19 WB and 11 EB), 10 left turn, and 6 sideswipe same direction crashes. 15% of crashes occur during the 1pm to 1:59pm time of day and another 15% occur during the 5pm to 5:59 pm time of day.	Flashing yellow arrows and countdown timers were installed in 2016. The City of Bismarck based on the LRSP has proposed confirmation lights in 2018.
Williston	US 2 & 58th St W	0	3	4	6	19	2013 = 19 2014 = 6 2015 = 7	32	186	16	2	There were 9 angle, 12 rear end, and 6 single vehicle crashes. 31% of crashes occur on Friday. 19% of crashes occur during the Noon to 12:59pm time of day.	Turn lanes were installed in 2013, temporary traffic signal was installed in 2014, EB turn lanes were installed in 2015. In 2016 this intersection will be upgraded to permanent traffic signal, PCN 20750. There is a concrete overlay project scheduled for 2017.
Minot	Broadway & 31st Ave SW	0	0	5	14	45	2013 = 28 2014 = 20 2015 = 16	64	184	17	17	There were 5 angle, 41 rear end, and 6 sideswipe same direction. 19% of crashes occurred with ice/snow roadway surface conditions. 27% of crashes occur during the Noon - 1:59pm time of day and another 19% of crashes occur during the 4pm - 4:59pm time of day.	Broadway signals were coordinator in 2016.
Grand Forks	Washington St & 17th Ave S	0	1	4	13	31	2013 = 9 2014 = 16 2015 = 24	49	182	18	44	The LRSP has proposed confirmation lights and advance walk for this intersection. The city made signal modification in 2014 so they recommend monitoring this intersection comparing before crashes to after countermeasure crashes.	The LRSP has proposed confirmation lights and advance countdown timers for this intersection. City implemented east/west flashing left turn arrows at this location in 2014 and countdown timers in 2015.
Fargo	32nd Ave S & 25th St	0	1	3	15	30	2013 = 16 2014 = 16 2015 = 17	49	182	18	6	There were 20 EB/WB rear end crashes, with 8 during non-dry conditions and with 9 of 20 between 3:20 and 5:15pm. There were 9 angle crashes, but no predominant direction or time-of-day. In 2015 there were 3 left turn crashes involving EB to NB left-turning vehicles, but no predominant time-of-day.	The LRSP has proposed confirmation lights and advanced walk for this intersection. The city will be installing advanced warnings for north and southbound traffic advising drivers of stopped traffic and congestion at the intersection. Safety project in 2017 will install retroreflective back plates and advanced walk.
Grand Forks	Columbia Rd & 17th Ave S	0	1	3	14	36	2013 = 14 2014 = 15 2015 = 25	54	182	18	33	There were 28 NB/SB rear end crashes, with 12 during non-dry conditions and with 10 of 28 between 2:00pm and 3:10pm. There were 5 left turn crashes that involved a SB to EB left-turning vehicle, with 3 during non-dry conditions and with 2 of 5 between 6:16pm and 6:35pm.	The LRSP has proposed confirmation lights and advance walk for this intersection. The city will be installing advanced warnings for north and southbound traffic advising drivers of stopped traffic and congestion at the intersection. Safety project in 2017 will install retroreflective back plates and advanced walk.
Bismarck	Bismarck Expwy & 7th St	0	0	4	13	51	2013 = 28 2014 = 19 2015 = 21	68	173	21	17	There were 45 rear end and 15 sideswipe same direction crashes. 26% of crashes occurred during the 5pm to 5:59pm time of day.	Flashing yellow arrows and countdown timers were installed in 2016.

2013-2015 Urban High Crash Locations

23 USC § 409 Documents
 NDDOT Reserves All Objections

City	Location	Crash Severity						Total By Year	Total Crashes	Weighted Total Crashes	Rank 2013-2015	Prior Rank	Trends	Related Projects/Recommendations
		Fatal	InjA	InjB	InjC	PDO								
Fargo	32nd Ave S & 45th St	0	1	2	14	32	2013 = 21 2014 = 18 2015 = 10	49	167	22	-	Total crashes reduced to only 10 in 2015.	N/A	
Fargo	13th Ave S & 32nd St / Westrac Dr	0	2	3	9	19	2013 = 10 2014 = 10 2015 = 13	33	164	23	26	There were 15 EB rear end crashes, with 10 between 1pm and 3:13pm. There were 3 ped/bike crashes in 2015; one involved a vehicle attempting to make an EB to SB right turn on green and hitting an EB wheelchair in the crosswalk, one involved a vehicle attempting to make a NB to EB right turn on red and getting hit by a WB rollerblader, and one involved a WB vehicle that entered on green and was hit by a SB bicyclist (bicyclist had red light).	The LRSP has proposed confirmation lights for this intersection. Countdown timers were installed in 2015. City plans on installing flashing yellow left turn arrows east & west on 13th Avenue in 2016 and will review traffic signal timing plans and work on improvements.	
West Fargo	9th St E & 13th Ave E	0	1	4	9	37	2013 = 22 2014 = 15 2015 = 14	51	164	23	9	There were 23 rear end crashes (8 WB, 7 EB, 4 NB, and 4 SB), with 11 of 23 during non-dry conditions. There were 13 left turn crashes: 5 involved EB to NB left-turning vehicles (3 of 5 during non-dry conditions) and 5 involved WB to SB left-turning vehicles. 3 crashes involved bicycles, and 2 of 3 involved bicyclists attempting to cross on a red light.	The LRSP has proposed confirmation lights, advance walk, and countdown timers for this intersection. PCN 20999 will restripe 2 NB thru lanes and add dual left turn lanes to all approaches.	
Williston	W Dakota Pkwy (US 2) & 9th Ave NW	0	2	4	3	43	2013 = 15 2014 = 21 2015 = 16	52	163	25	29	There were 18 rear end and 14 left turn crashes. No other crash trends identified.	The LRSP has proposed confirmation lights, advance walk, countdown timers, and median refuges for this intersection. Turn lanes were installed in 2013 and a third north bound through lane was installed terminating at 9th Ave NW in 2014.	
Williston	US 2 & 42nd S: W	0	1	3	6	65	2013 = 25 2014 = 29 2015 = 21	75	163	25	36	There were 12 angle, 45 rear end (19NB, 19SB, 6 EB, and 1 WB), and 5 sideswipe same direction crashes. 19% of crashes occurred with ice/snow roadway surface conditions. 22% of crashes occur during the 5pm to 6:59 pm time of day.	The LRSP has proposed confirmation lights, advance walk, and countdown timers for this intersection. In 2016, NDDOT is scheduled to install a second north bound left turn lane and close the south east frontage road/42nd St intersection and the northwest 42nd St intersection, PCN 21177.	
Fargo	Main Ave & 45th St	0	2	2	10	22	2013 = 10 2014 = 11 2015 = 15	36	162	27	49	There were 16 rear end crashes (7 NB, others spread among all directions). There were 9 left turn crashes, no predominant direction, but 5 of 9 occurred between 8:04pm and 9:30pm.	The LRSP has proposed confirmation lights for this intersection. City will review traffic signal timing plans and work on improvements.	
Bismarck	Bismarck Expwy & I-94 EB Ramps	0	0	7	9	29	2013 = 16 2014 = 6 2015 = 23	45	160	28	-	There were 31 rear end crashes (12 NB, 8 SB, and 10 EB). 20% of crashes occurred with ice/snow roadway surface conditions.	N/A	

2013-2015 Urban High Crash Locations

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City	Location	Crash Severity					Total By Year	Total Crashes	Weighted Total Crashes	Rank 2013-2015	Prior Rank	Trends	Related Projects/Recommendations
		Fatal	InjA	InjB	InjC	PDO							
Bismarck	State St & I-94 EB Ramps	0	0	4	13	37	2013 = 12 2014 = 26 2015 = 16	54	159	29	48	N/A There were 30 rear end (14 NB and 11 SB) and 7 sideswipe same direction crashes.	
Bismarck	State St & I-94 WB Ramps	0	2	1	7	46	2013 = 12 2014 = 19 2015 = 25	56	157	30	34	N/A There were 9 angle, 34 rear end (22 NB), and 7 sideswipe same direction crashes. Total crashes have been increasing. 29% of crashes occur during the Noon to 2:59pm time of day.	
Fargo	45th St & 17th Ave S	0	0	2	13	57	2013 = 33 2014 = 16 2015 = 23	72	157	30	15	City plans on conducting a corridor study on 17th Avenue S from 45th Street to I-29 in 2016. City will review traffic signal timing plans and work on improvements.	
Fargo	Main Ave & I-29 NB Ramps	0	1	4	8	36	2013 = 19 2014 = 14 2015 = 16	49	157	30	46	City will be tying city signal system fiber optic cable into the NDDOT's cabinet so that the controllers will be running off the same clock and will review traffic signal timing plans and work on improvements.	
Bismarck	3rd St & Front Ave	0	2	3	6	29	2013 = 10 2014 = 14 2015 = 16	40	156	33	-	N/A There were 20 angle and 10 rear end crashes. 25% of crashes occurred with ice/snow roadway surface conditions. 15% of crashes occur during the noon to 12:59pm time of day.	
Williston	W Dakota Pkwy (US 2) & 6th Ave W	0	0	8	5	37	2013 = 14 2014 = 13 2015 = 23	50	155	34	-	N/A There were 28 angle(23 SB+EB) and 11 rear end crashes. 16% of crashes occur during the 5pm t 5:59pm time of day.	
Fargo	45th St & 19th Ave S	0	0	1	13	65	2013 = 32 2014 = 19 2015 = 28	79	154	35	30	City will review traffic signal timing plans and work on improvements. There were 40 SB rear end crashes, with 27 between 3pm and 7:45pm and with 16 of 40 during non-dry conditions. In 2015 there were 7 EB rear end crashes, with 5 in the EB to SB right turn lane.	
Grand Forks	Demers Ave & 42nd St	0	1	2	10	42	2013 = 23 2014 = 22 2015 = 10	55	153	36	28	Total crashes reduced to only 10 in 2015. The LRSP has proposed confirmation lights and advance walk for this intersection. The city recommendation is to incorporate the low cost striping change into the NDDOT 2017 project. Safety project in 2017 will install retroreflective back plates and advanced walk.	
Fargo	25th St & I-94 EB Ramps	0	1	2	10	42	2013 = 23 2014 = 22 2015 = 10	55	153	36	37	This intersection was completely reconstructed and re-configured in 2014. Total crashes dropped to only 10 in 2015.	

2013-2015 Urban High Crash Locations

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City	Location	Crash Severity					Total By Year	Total Crashes	Weighted Total Crashes	Rank 2013-2015	Prior Rank	Trends	Related Projects/Recommendations
		Fatal	InjA	InjB	InjC	PDO							
Bismarck	State St & Divide Ave	0	0	2	10	71	2013 = 37 2014 = 24 2015 = 22	83	153	36	24	N/A	
Grand Forks	32nd Ave S & 31st St	0	0	4	13	27	2013 = 16 2014 = 15 2015 = 13	44	149	39	39	The LRSP has proposed confirmation lights, advance walk, and countdown timers for this intersection. Consider realignment of the left turn lanes to eliminate negative offset and protected only lefts.	
Minot	US 2 & Evergreen Ave	0	3	2	4	13	2013 = 8 2014 = 8 2015 = 6	22	146	40	35	There were 11 angle crashes. There are no other identified crash trends.	Consider access closure or other access modifications.
Bismarck	Bismarck Expwy & Washington St	0	0	1	12	63	2013 = 37 2014 = 22 2015 = 17	76	146	40	10	There were 45 rear end and 12 sideswipe same direction crashes. No specific time of day.	The City of Bismarck based on the LRSP has proposed confirmation lights and countdown timers in 2018.
Bismarck	7th St & Rosser Ave	0	2	4	3	22	2013 = 12 2014 = 8 2015 = 11	31	142	42	43	There were 11 angle (85B+EB), 6 rear end, and 10 sideswipe same direction crashes. 26% of crashes occurred with ice/snow roadway surface conditions.	The City of Bismarck based on the LRSP has proposed countdown timers in 2018.
Fargo	19th Ave N & University Dr	0	2	2	6	24	2013 = 11 2014 = 8 2015 = 15	34	140	43	-	There were 8 left turn crashes involving WB to SB left-turning vehicles, with 3 during ice/snow conditions and with 3 between 5:06pm and 5:35pm. There were 7 left turn crashes involving EB to NB left-turning vehicles, with 3 during non-dry conditions and with 3 between 5:05pm and 5:30pm.	N/A
Williston	US 2 & 139th Ave NW	0	2	2	4	35	2013 = 18 2014 = 19 2015 = 6	43	139	44	-	There were 6 angle and 23 rear end crashes. 16% of crashes occurred with ice/snow roadway surface conditions.	N/A
Bismarck	Century Ave & 4th St	0	0	4	10	33	2013 = 14 2014 = 15 2015 = 18	47	137	45	-	There were 16 angle (10 NB+WB), 20 rear end, and 6 left turn crashes. 38% of crashes occurred with ice/snow roadway surface conditions.	N/A
Williston	US 2 & 32nd Ave W / 138th Ave NW	0	2	5	1	16	2013 = 8 2014 = 7 2015 = 9	24	135	46	21	There were 8 angle and 8 rear end crashes. No other crash trends identified.	Temporary traffic signal was installed in 2011, turn lanes were installed in 2013, and intersection reconstruction is scheduled for 2017.
Grand Forks	32nd Ave S & Columbia Rd	0	0	5	9	25	2013 = 14 2014 = 15 2015 = 10	39	134	47	39	Total crashes reduced to only 10 in 2015.	The LRSP has proposed confirmation lights and advance walk for this intersection. Safety project in 2017 will install retroreflective back plates and advanced walk.

2013-2015 Urban High Crash Locations

23 USC § 409 Documents
 NDDOT Reserves All Objections

City	Location	Crash Severity					Total By Year	Weighted Total Crashes	Rank 2013-2015	Prior Rank	Trends	Related Projects/Recommendations
		Fatal	InjA	InjB	InjC	PDO						
Fargo	45th St & I-94 WB Ramps	0	0	1	12	49	2013 = 18 2014 = 22 2015 = 22	132	48	-	There were 28 WB rear end crashes, 10 SB rear end crashes, and 7 WB sideswipe crashes. No patterns were identified.	N/A
Fargo	University Dr & I-94 EB Ramps	0	0	4	11	21	2013 = 12 2014 = 10 2015 = 14	131	49	-	There were 13 angle crashes involving SB+EB vehicles, no premoninant time of day. There were 2 ped/bike crashes, but each involved different vehicle movements and times of day and were only possible injuries.	N/A
Bismarck	Century Ave & 11th St	0	1	3	6	33	2013 = 16 2014 = 14 2015 = 13	131	49	-	There were 12 angle and 16 rear end crashes. 30% of crashes occurred with ice/snow roadway surface conditions.	N/A

Notes:

1. Urban = community with population of 5,000 or more.
2. InjA = Incapacitating Injury, InjB = Non-Incapacitating Injury, InjC = Possible Injury, PDO = Property Damage Only.
3. Weighted Total = 50*Fatal Crashes + 29*Incapacitating Injury Crashes + 11*Non-Incapacitating Injury Crashes + 1*Property Damage Only Crashes

Number of Locations on 3yr Urban Listing:

16	Bismarck
16	Fargo
7	Grand Forks
7	Williston
3	Minot
1	West Fargo
50	Total

2013-2015 High Crash Locations Bismarck



Crash Period Used = 1/1/2013 to 12/31/2015.

● Urban Points

PREPARED BY THE
 North Dakota Department of Transportation
 Programming Division
 Traffic Operations Section
 September 2016

23 USC § 409 Documents
 NDDOT Reserves All Objections



2017-2018
UNIFIED PLANNING WORK PROGRAM

DRAFT

THE SIGNATURE ON THE LINE THAT FOLLOWS CONSTITUTES THE OFFICIAL ADOPTION OF THE 2017-2018 UNIFIED PLANNING WORK PROGRAM (UPWP) BY THE BISMARCK-MANDAN METROPOLITAN PLANNING ORGANIZATION (MPO). THE UPWP WAS ADOPTED ON

DOUG SCHONERT, CHAIRPERSON
BISMARCK-MANDAN MPO

DATE

BISMARCK-MANDAN METROPOLITAN PLANNING ORGANIZATION
UNIFIED PLANNING WORK PROGRAM
January 2017 through December 2018

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INTRODUCTION

The Unified Planning Work Program (UPWP) is a description of the multi-modal transportation planning projects that will be conducted in the Bismarck/Mandan MPO area in calendar years 2017 and 2018. This biennial document is the foundation for requesting federal funds as well as a control tool for scheduling, budgeting and monitoring the transportation planning process.

The 2017-2018 UPWP was developed with the input of the North Dakota Department of Transportation (NDDOT), Federal Transit Administration (FTA), and Federal Highway Administration (FHWA), Bis-Man Transit and the jurisdictional partners of the MPO (Bismarck, Lincoln, Mandan, Burleigh County and Morton County). Also, public input from previous MPO studies was used to form the 2017-2018 UPWP.

The 2017-2018 UPWP is the MPO's budgeting action tool that takes the goals and projects from the active MPO Long Range Transportation Plan (2015-2040 LRTP) and formats the chosen projects into a budgeting action plan.

It is hoped that this 2017-2018 UPWP will not only provide the MPO with a very useful budgeting, scheduling and monitoring tool, but will also provide an understandable expectation of what the MPO will endeavor in 2017 and 2018, with the public's help.

UPWP NEW ADDITIONS

This UPWP addresses two Federal emphasis areas of *Performance Based Planning & Programming* and *Access to Essential Services* to a greater degree than any previous UPWP.

The included tasks and projects of the 2017-2018 UPWP brings forth the development and implementation of a performance management approach to transportation planning and programming that supports the achievement of transportation system performance outcomes.

In addition, the projects of this UPWP address access to essential services as part of the transportation connectivity gaps in access to essential services. Essential services include housing, employment, health care, schools/education, and recreation.

Also, included in the appendix of the UPWP, is a matrix table of MPO staff allocation of time by Task.

The projects listed below represent the selected projects that were developed from either a specific project description or a goal set forward in the 2015-2040 LRTP.

Projects contained in this UPWP as recommended in the 2015-2040 LRTP are:

- Downtown Mandan Subarea Study
- Update the Transit Development Plan
- Bicycle and Pedestrian Plan to help address non-motorized issues and opportunities in the MPO area

- Bismarck-Mandan School Crossing Safety Study
- MPO Regional Freight Plan
- MPO 2020-2045 MTP
- MPO Alternatives Funding Study

The Long Range Transportation Plan identifies the following seven goals:

1. Maintain and improve regional mobility and connections.
2. Enhance regional alternatives to automobile travel.
3. Maintain the transportation system in a state-of-good-repair.
4. Coordinate transportation planning with the natural and built environment.
5. Provide a transportation system that effectively moves goods and enhances the local economy.
6. Provide a safe and secure transportation system.
7. Identify transportation supportive funding and policy opportunities.

Following is a table which identifies which LRTP Goals are addressed by the 2017-2018 UPWP identified Studies.

LRTP Goals

	1	2	3	4	5	6	7
Mandan Downtown Subarea Study	x	x		x	x	x	
School Crossing Safety Study		x	x		x		
Transit Development Plan	x	x	x			x	
Bicycle Pedestrian Plan	x	x	x	x	x		
Alternative Funding Study							x
Freight Plan	x				x	x	
Long Range Transportation Plan	x	x	x	x	x	x	x

The MPO is allowed to move funding between tasks to an amount up to 10% of the total cumulative yearly amount, without North Dakota Department of Transportation (NDDOT) and Federal Highway Administration (FHWA) approval. Funding added over the contract amounts, new projects, or budgetary changes in excess of 10% (cumulative) will continue to require NDDOT and FHWA/Federal Transit Administration (FTA) approvals of amendments to the UPWP. In addition, the MPO must advise the NDDOT and FHWA/FTA of any budgetary changes within the 10% limits described above.

TIMELINE FOR METROPOLITAN TRANSPORTATION PLAN

- 2016
 - Purchase Socio-Economic Data (Household and Employment Estimates) [1-2Q]
 - Update the Traffic Analysis Zone (TAZ) Structure [3-4Q]
 - ‘Clean-Up’ Socio-Economic Data (Household and Employment Estimates) [3-4Q]
 - Develop the Metropolitan Transportation Plan (MTP) Development Plan and Travel Demand Model (TDM) Review RFP [3-4Q]
- 2017
 - Execute the MTP Development Plan and TDM Review Study [1Q]
 - Assess the need for additional data for the MTP and TDM [1Q]
 - Determine Forecast Methodology and Growth Scenarios [1-2Q]
 - Develop the baseline population and employment estimates and the 2040 projections [1-2Q]
 - Allocate future (2025-2035 mid, 2035-2045 long) residents and employees by TAZ [1-2Q]
 - Review the Travel Demand Model [2-3Q]
 - ATAC updates Travel Demand Model (TDM) [1Q]
 - Update the TDM’s TAZ structure and roadway network to reflect current conditions
 - Input the most recent population and employment estimates and projections.
 - Purchase Origin-Destination Data to be used to calibrate the updated TDM [1Q]
 - Develop the RFP for the 2020-2045 Metropolitan Transportation Plan (MTP) [3-4Q]
- 2018
 - Begin 2020-2045 MTP update [1-2Q]
- 2020
 - Adoption of 2020-2045 MTP [1-2Q]

PLANNING EMPHASIS AREAS

Federal Highway Administration (FHWA) and Federal Transit Administration (FTA) have encouraged MPOs to give prioritization in project selection to the following Planning Emphasis Areas: MAP-21 Implementation, Regional Models of Cooperation, and Ladders of Opportunity.

The 2017-2018 UPWP contains several projects that embrace those concepts. The Transportation Performance Measures (Task 201) will aid the MPO in its performance measures development under MAP-21 Implementation.

Three of the projects in Planning Studies (Task 204) embrace the concepts set out in the Ladders of Opportunity program. Those projects include two new initiatives that have previously been unaddressed but needed in the MPO: the Bike and the Pedestrian Plan and the Freight Plan. A third study, the School Crossing Safety Study has been addressed previously but is very much needed since our population and schools have changed a great deal since the last study in 2005.

MPO SELF CERTIFICATION

*This is an abridged version of the complete MPO Self Certification document.
The complete document, in its entirety, can be viewed at the Bismarck-Mandan MPO offices.*

23 United States Code (U.S.C.) 450.336 requires Metropolitan Planning Organizations to regularly certify that their planning process is being carried out in accordance with applicable requirements; also, that the planning process supports the development of a comprehensive Metropolitan Transportation Plan (MTP) and a Transportation Improvement Program that are consistent concerning the following applicable federal regulations:

1. 23 U.S.C. 134, 49 U.S.C. 5303, and this subpart;
2. In nonattainment and maintenance areas, sections 174 and 176 (c) and (d) of the Clean Air Act, as amended (42 U.S.C. 7504, 7506 (c) and (d)) and 40 CFR part 93;
3. Title VI of the Civil Rights Act of 1964, as amended (42 U.S.C. 2000d-1) and 49 CFR part 21;
4. 49 U.S.C. 5332, prohibiting discrimination on the basis of race, color, creed, national origin, sex, or age in employment or business opportunity;
5. Section 1101(b) of the FAST Act (Pub. L. 114-357) and 49 CFR part 26 regarding the involvement of Disadvantaged Business Enterprises (DBE) in USDOT funded projects;
6. 23 CFR part 230, regarding the implementation of an equal employment opportunity program on Federal and Federal-aid highway construction contracts;
7. The provisions of the Americans with Disabilities Act of 1990 (42 U.S.C. 12101 et seq.) and 49 CFR parts 27, 37, and 38;
8. The Older Americans Act, as amended (42 U.S.C. 6101), prohibiting discrimination on the basis of age in programs or activities receiving Federal financial assistance;
9. Section 324 of title 23 U.S.C. regarding the prohibition of discrimination based on gender; and
10. Section 504 of the Rehabilitation Act of 1973 (29 U.S.C. 794) and 49 CFR part 27 regarding discrimination against individuals with disabilities.

Bismarck-Mandan MPO Policy Board Chair

Date

BISMARCK-MANDAN MPO ACTIVITIES SUPPORTING TITLE VI AND ENVIRONMENTAL JUSTICE

The MPO recognizes Title VI and Environmental Justice requirements as they relate to the planning process. The requirements directly affect such elements within the planning process including, but not limited to, plan development, public involvement, and project management decisions.

Title VI of the Civil Rights Act of 1964

Title VI of the Civil Rights Act of 1964 states: “No person in the United States shall, on the grounds of race, color or national origin, be excluded from participation in, be denied the benefits of, or be subjected to discrimination under any program or activity receiving federal financial assistance.”

The Bismarck-Mandan MPO Policy Board approved changes to the MPO’s Title VI and Non-Discrimination/ADA Plan in July 2016. Originally adopted in 2011, this document provides policies prohibiting discrimination on the basis of race, color, or national origin. The Title VI/ADA Coordinator is identified within the Title VI Plan and contact information is also provided.

There is also a section within the document which provides information, forms and instructions relative to filing complaints in the event any individual feels he/she has been discriminated against in the MPO’s programs or processes. The Bismarck-Mandan MPO has not, to date, received or been notified of any complaints alleging discrimination.

The Title VI and Non-Discrimination/ADA Plan is subject to annual audits performed by the Title VI/ADA Coordinator in conjunction with MPO staff to assess the program’s effectiveness at all levels and to ensure continued compliance with Title VI requirements. The audits are completed each year by March 31 following the reporting year ending December 31.

The Title VI and Non-Discrimination/ADA Plan contains a section which includes a list of MPO staff and appointed positions within the MPO, including the Technical Advisory Committee and Policy Board. It identifies how each position is appointed and details the responsibilities of each as it relates to Title VI.

Additionally, training programs for all MPO employees on Title VI and other related statutes are conducted annually, and will consist of, minimally, one hour of training per reporting period.

Bismarck-Mandan MPO maintains maps within the Title VI and Non-Discrimination/ADA Plan indicating high concentrations of minority, low-income, and elderly and limited English proficiency populations for consideration in planning and programming activities.

Finally, the Bismarck-Mandan MPO also includes “Required Contract Provisions Federal-Aid Construction Contracts”, appropriate FTA Federal Clauses, and “Title VI Assurances”, which contain language prohibiting discrimination of groups identified

in the Civil Rights Act of 1964, within all of the Request for Proposals (RFPs) and contracts for all studies solicited by Bismarck-Mandan MPO.

Environmental Justice

Executive Order 12989, *Federal Actions to Address Environmental Justice in Minority Populations and Low-Income Populations*, ensures non-discrimination against minority populations by discouraging programs, policies, and activities with disproportionately high and adverse human health or environmental effects on minority and low-income populations.

Bismarck-Mandan MPO's Public Participation Plan, originally adopted May 2010, requires the evaluation of adverse impacts through MPO activities to "Environmental Justice" groups including low-income and minority populations. The MPO maintains maps with high concentrations of minority, low-income, limited English proficiency, and elderly populations for consideration in planning and programming activities. These maps are included in the Title VI and Non-Discrimination/ADA Plan, the 2015-2040 Long Range Transportation Plan (the Metropolitan Transportation Plan, or MTP, updated every five years), and the Transportation Improvement Program (updated annually). The socio-economic data used to maintain the maps is utilized in a variety of applications, including MPO studies and the production and updating of the Bismarck-Mandan Metropolitan Planning Organization Monitoring Report.

Further, the MPO seeks the active participation of Environmental Justice populations in the planning process as identified in the Public Participation Plan. The document indicates that meeting facilities should be accessible to mobility impaired individuals and meetings should be scheduled at various times to accommodate various work schedules. Contact information for the Title VI/ADA Coordinator is provided within the Title VI Plan and is also provided on MPO meeting agendas and on the MPO webpage to ensure accessibility by individuals with disabilities to request appropriate provisions, auxiliary aids, or services for meeting facilities or materials. Forms, along with complete instructions, to request reasonable accommodations and processes for filing of complaints about violations are also provided. To date, the Bismarck-Mandan MPO has not received or been notified of any complaints alleging discrimination.

Bismarck-Mandan MPO maintains a data base of approximately 130 transportation stakeholders within the Bismarck-Mandan Metropolitan Planning Area (MPA). The stakeholders are sent notification and/or draft copies of various studies and programs including, but not limited to, the Metropolitan Transportation Plan (MTP) and the Transportation Improvement Program (TIP), as well as newsletter updates which provide information on MPO activities. A variety of organizations representing low-income, minority, and elderly agencies and advocacy groups are on the MPO stakeholder list.

Bismarck-Mandan MPO continues to increase accessibility to its programs and activities by all applicants, participants, and members of the public regardless of race, color, national origin, sex, age, disability/handicap, or income status and has recently

installed display racks containing the Title VI and Non Discrimination/ADA Plan, the Title VI Policy Statement, LEP Plan, ADA reasonable accommodations request forms, Title VI complaint forms and procedures, and newsletters at the entrances of the MPO work site. Additionally, forms, documents, meeting information, and study updates are made accessible via social media using Facebook to link to the MPO webpage. Copies of adopted programs and plans, such as the TIP and the MTP, as well as final reports of adopted MPO studies are made available through the public libraries in both Bismarck and Mandan.

ADMINISTRATION

100

**101 GENERAL ADMINISTRATION, COORDINATION AND LIAISON
2017-2018**

Objective:

Through this task, the MPO manages and coordinates the accounts, records, agreements, and administration of contracts for the Unified Planning Work Program and the Bismarck-Mandan area Metropolitan Planning Organization; also to provide the necessary coordination and communications between the various agencies in the Bismarck-Mandan Metropolitan area and provide for citizen information and involvement.

Present Status:

The Bismarck-Mandan Area Metropolitan Planning Organization (MPO) is presently staffed with two Transportation Planners, one part-time Transportation Planner, and a Transportation Specialist, who are responsible for coordinating MPO activities with the various entities within the boundaries of the MPO, which represents the MPO's operational and technical agencies. Work accomplished under this task in 2016 included reporting and billing activities and preparations for and attendance at the Technical Advisory Committee (TAC) and MPO Policy Board Meetings.

Proposed Work:

Compile and maintain records of MPO work in progress as performed by individual consulting companies and submit them to the North Dakota Department of Transportation. Prepare monthly billings for MPO activities in progress as outlined in the Unified Planning Work Program and receive and disburse funds received for these MPO activities. Prepare and administer transit grants for local transit service.

The MPO/Transportation Planners provide liaison activities to the MPO's membership including preparation of agendas and minutes, scheduling and attendance at Technical Advisory Committee (TAC) and MPO Policy Board meetings. The MPO also takes the leadership in the development and implementation of the Metropolitan Transportation Plan (formerly the Long Range Transportation Plan), and other required elements of the Moving Ahead for Progress in the 21st Century (MAP-21) and Fixing America's Surface Transportation (FAST) Act, including updating of the Unified Planning Work Program, Transportation Improvement Program, and other MPO actions where necessary and appropriate.

Products:

Products of the MPO include formal meetings of the MPO Policy Board and Technical Advisory Committee (TAC) and submission of billings and monthly activity summaries, coordination and management of all MPO accounts and records.

The MPO produces a Transportation Improvement Plan every year, a Metropolitan Transportation Plan and Transit development Plan every 5 years and Public Participation plan as needed.

Completion Date:
Ongoing Activity.

Estimated Expenditures:	<u>2017</u>	<u>2018</u>
General Staff Administration of MPO Program*	\$236,940	\$237,438
Direct Administration Costs Charged from Bismarck**	34,000	34,000
Office Space Rental	9,500	9,500
Office Equipment and Supplies	1,800	1,800
Telephone Service	400	400
Mileage	600	600
Postage	700	700
Printing	2,000	2,000
Direct Miscellaneous Costs	1,000	1,000
TOTAL	286,940	287,438
Proposed Source of Funds:		
FHWA/FTA (80% or less)	229,552	229,950
Local (20% or greater)	57,388	57,488
TOTAL	286,940	287,438

*Staff includes 3 full time members (2 Transportation Planners and 1 Transportation Specialist) and 1 part time Transportation Planner.

** Charged Costs from Bismarck include Human Resources, Fiscal Services, and Attorney/Administration, and IT/GIS.

100.101.00

ADMINISTRATION
(All Amounts in Dollars \$)

YEAR 2017

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	286,940	229,552	57,388	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other	0	0	0	
TOTALS	286,940	229,552	57,388	

YEAR 2018

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	287,438	229,950	57,488	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other	0	0	0	
TOTAL	287,438	229,950	57,488	

**102 TRAINING/TRAVEL AND EDUCATION
2017-2018**

Objective:

To provide MPO support staff with appropriate skills to carry out the comprehensive, continuing and coordinated Transportation Planning Process.

Present Status:

Training activities undertaken during 2016 have included a MPO staff members attending a APA conference in Phoenix, Arizona, and a Tools of the Trade Conference in Charleston, South Carolina.

Proposed Work:

The MPO will encourage staff attendance at selected national/local short courses, seminars and conferences. The MPO will work with other MPOs, FHWA, FTA and the NDDOT to develop and support local training programs.

Products:

To foster a more informed, capable and efficient staff.

Completion Date:

Ongoing Activity.

Estimated expenditures:	<u>2017</u>	<u>2018</u>
Associated Training Costs	\$5,500	\$5,500
Transportation and Lodging	9,700	9,700
Books/Subscriptions/Dues of	700	700
Transportation Planning Material and Organizations		
Non-local mileage	600	600
TOTAL	16,500	16,500

Proposed Source of Funds:

FHWA/FTA (80%)	13,200	13,200
Local (20%)	3,300	3,300
TOTAL	16,500	16,500

100.102.00

TRAINING, EDUCATION & ASSOCIATED TRAVEL

(All Amounts in Dollars \$)

YEAR 2017

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	16,500	13,200	3,300	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other	0	0	0	
TOTALS	16,500	13,200	3,300	

YEAR 2018

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	16,500	13,200	3,300	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other	0	0	0	
TOTAL	16,500	13,200	3,300	

**103 UNIFIED PLANNING WORK PROGRAM DEVELOPMENT
2017-2018**

Objective:

To prepare a Unified Planning Work Program (UPWP) for the Bismarck-Mandan Metropolitan Planning Organization and any subsequent UPWP amendments.

Present Status:

The Bismarck-Mandan Metropolitan Planning Organization has operated under a unified work program for the past twenty-four years.

Proposed Work:

The 2019-2020 Unified Planning Work Program will be developed by the MPO staff, with assistance from the Planning and Engineering departments of the Cities of Bismarck, Mandan, Lincoln, and Burleigh/Morton Counties, as well as being offered for review and input by local citizen groups as required under Moving Ahead for Progress in the 21st Century (MAP-21) and Fixing America's Surface Transportation (FAST) Act. Maintenance of the 2017-2018 UPWP will be provided by the MPO staff.

Products:

2019-2020 Unified Planning Work Program and Amendments

Completion Date:

Preliminary Draft: September 2018
Final UPWP: October 2018

Estimated Expenses:

	<u>2017</u>	<u>2018</u>
Development of UPWP and Amendments	\$0	7,000
TOTAL	0	7,000

Proposed Source of Funds:

FWHA/FTA (80%)	0	5,600
Local (20%)	0	1,400
TOTAL	0	7,000

100.103.00

UNIFIED PLANNING WORK PROGRAM

(All Amounts in Dollars \$)

YEAR 2017

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	0	0	0	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other	0	0	0	
TOTALS	0	0	0	

YEAR 2018

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	7,000	5,600	1,400	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other	0	0	0	
TOTAL	7,000	5,600	1,400	

**104 MICROCOMPUTER ENHANCEMENTS AND SOFTWARE
2017-2018**

Objectives:

To enhance the MPO’s capabilities to monitor transportation data traffic forecasting, and traffic operations. To overall improve MPO staff’s ability to provide analysis, communication, and distribute applicable transportation related data. To keep staff informed on pertinent transportation issues. To build and furnish reports to satisfy FHWA, FTA, and NDDOT reporting requirements.

Present Status:

During 2015-2016 the Bismarck-Mandan MPO used computers and associated software to aid the transportation planning efforts of Bismarck, Mandan, Lincoln, Morton County & Burleigh County within the MPO area.

Proposed Work:

To provide computer hardware and software aid to the transportation planning efforts of the MPO.

Products:

To provide the MPO with effective administration, data processing, and analytical tools for transportation planning.

Completion Date:

Ongoing Activity.

Estimated Expenditures:

	<u>2017</u>	<u>2018</u>
Computers and Misc. Hardware	\$2,300	\$2,800
Computer Software	1,000	1,000
TOTAL	3,300	3,800

Proposed Source of Funds:

FHWA/FTA (80%)	2,640	3,040
Local (20%)	660	760
TOTAL	3,300	3,800

100.104.00

COMPUTER ENHANCEMENTS & SOFTWARE

(All Amounts in Dollars \$)

YEAR 2017

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	3,300	2,640	660	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other	0	0	0	
TOTALS	3,300	2,640	660	

YEAR 2018

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	3,800	3,040	760	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other	0	0	0	
TOTAL	3,800	3,040	760	

**105 TRANSIT SYSTEM ADMINISTRATION AND LIAISON
2017-2018**

Objective:

To provide technical assistance and coordinated transportation planning with Bis-Man Transit. Work to efficiently operate and expand the existing transit system at a minimal cost to the Bismarck-Mandan transit users.

Present Status:

The Elderly and Disabled para-transit service has been in service for twenty six years, beginning in 1990. This service is a 24 hour, 7 day a week, demand response system. A fixed route bus service for the total population servicing Bismarck and Mandan began in 2004 and continues to try to gain ridership.

Proposed Work:

Promote expansion of ridership and service routes, and maintain day-to-day administrative liaison. The Bismarck-Mandan MPO will aid in the administration of local coordination and control functions, and help with the development of the fixed route and demand response bus systems. To act as a liaison between FTA and member agencies of the MPO regarding FTA and NDDOT grant applications, reports and meetings.

Products:

Grants pertaining to Operations, Bus and Bus Facilities, State of Good Repair and Mobility of Seniors and Persons with Disabilities, along with all the associated reporting of the grants.

Completion Date:

Ongoing.

Estimated Expenditures:

	<u>2017</u>	<u>2018</u>
Transit Liaison and Administration	\$14,429	14,429
TOTAL	14,429	14,429

Proposed Source of Funds:

FWHA/FTA (80%)	11,543	11,543
Local (20%)	2,886	2,886
TOTAL	14,429	14,429

100.105.00

TRANSIT SYSTEM ADMINISTRATION

(All Amounts in Dollars \$)

YEAR 2017

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	14,429	11,543	2,886	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other	0	0	0	
TOTALS	14,429	11,543	2,886	

YEAR 2018

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	14,429	11,543	2,886	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other	0	0	0	
TOTAL	14,429	11,543	2,886	

TRANSPORTATION PLANNING

200

**201 PERFORMANCE MEASURES
2017-2018**

Objective:

To develop performance measures, targets, and evaluation processes from the trends of the Transportation Analysis and Monitoring task, FHWA and NDDOT suggestions and requirements, and recommendations from the 2015- 2040 Long Range Transportation Plan.

Present Status:

The Bismarck-Mandan MPO is required to establish transportation related performance goals and objectives as well as methods to measure how effectively the area is meeting the established goals and objectives. It is further anticipated that performance measures will be established for significant modes of travel in the area. Currently performance measures have been recommended for transit activities within the 2012-2017 Transit Development Plan “Mobility 2017”, and the current 2015-2040 LRTP “Envision 2040”.

Products:

It is anticipated that performance measures will be established for the Bismarck-Mandan MPO area. An annual surveillance and monitoring report was developed to assist in evaluating adopted performance measures. The performance measures may be developed internally by MPO staff or may be contracted out for development, but this UPWP task item is strictly for performance measure development by MPO staff.

Estimated Expenditures:

	<u>2017</u>	<u>2018</u>
Performance Measures Development	\$9,404	\$9,404
TOTAL	9,404	9,404

Proposed Funding Sources:

FHWA/FTA (80%)	7,523	7,523
Local (20%)	1,881	1,881
TOTAL	9,404	9,404

200.201.00

TRANSPORTATION PERFORMANCE MEASURES

(All Amounts in Dollars \$)

YEAR 2017

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	9,404	7,523	1,881	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other	0	0	0	
TOTALS	9,404	7,523	1,881	

YEAR 2018

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	9,404	7,523	1,881	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other	0	0	0	
TOTAL	9,404	7,523	1,881	

**202 TRANSPORTATION ANALYSIS AND MONITORING
2017-2018**

Objective:

To continually monitor trends of the Bismarck-Mandan metropolitan area transportation system.

Present Status:

It is anticipated that the Bismarck-Mandan MPO will need to monitor transportation trends for significant transportation modes for a variety of reasons including but not limited to performance measures, transportation modeling, and other transportation planning related efforts. Additionally, there have been a variety of recommendations offered to enhance transportation modeling in the area.

Products:

The MPO re-established an annual surveillance and monitoring report. This report monitors transportation, socio-economic, and related trends to assist in the transportation planning process.

Estimated Expenditures:

	<u>2017</u>	<u>2018</u>
Analysis and Monitoring	\$8,324	\$8,324
TOTAL	8,324	8,324

Proposed Funding Sources:

FHWA/FTA (80%)	6,659	6,659
Local (20%)	1,665	1,665
TOTAL	8,324	8,324

200.202.00

TRANSPORTATION ANALYSIS AND MONITORING

(All Amounts in Dollars \$)

YEAR 2017

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	8,324	6,659	1,665	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other*	0	0	0	
TOTALS	8,324	6,659	1,665	

YEAR 2018

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	8,324	6,659	1,665	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other	0	0	0	
TOTAL	8,324	6,659	1,665	

**203 MONITORING AND REPORTING
2017-2018**

Objective:

To continually monitor the growth and development of the Bismarck-Mandan metropolitan area and its effects on land use, traffic flows and the overall transportation system.

Present Status:

The Long Range Transportation Plan for the Bismarck-Mandan Metropolitan Planning Organization (MPO), “Envision 2040”, was completed in 2015. Population and Employment estimates were developed for that LRTP and other MPO studies prior to the commencement of the LRTP.

Annual or more frequent review and updates of the population and employment data, including census data, by traffic analysis zones (TAZ) will be performed using building permits issued by local units of government as its primary source of information.

The updated population and employment data will be reviewed to determine if there are significant differences in growth patterns from those projected.

Products:

The Socio-Economic data report compiled will be used for the next MPO Metropolitan Transportation Plan in 2020. An annual surveillance and monitoring report has been developed. Updates to the report will continue to monitor transportation, socio-economic, and related trends to assist in the transportation planning process.

Estimated Expenditures:

	<u>2017</u>	<u>2018</u>
Monitoring and Reporting	\$6,058	\$6,058
TOTAL	6,058	6,058

Proposed Funding Sources:

FHWA/FTA (80%)	4,846	4,846
Local (20%)	1,212	1,212
TOTAL	6,058	6,058

200.203.00

MONITORING & REPORTING

(All Amounts in Dollars \$)

YEAR 2017

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	6,058	4,846	1,212	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other	0	0	0	
TOTALS	6,058	4,846	1,212	

YEAR 2018

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	6,058	4,846	1,212	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other	0	0	0	
TOTAL	6,058	4,846	1,212	

**204 PLANNING STUDIES
2017-2018**

Objective:

To provide for studies of specific transportation concerns that may have an impact on the MPO's Transportation Plan, Transportation Improvement Program or MPO planning process.

Present Status:

Presently using the adopted 2015-2040 Long Range Transportation Plan as a master plan, local partner entities must determine the timing of the studies recommended in the transportation plan. The 2015 -2040 Long Range Plan Study recommendations, as well as other study needs brought before the MPO are being considered before the MPO.

Proposed Work:

The proposed 2017-2018 studies include the completion of the following studies: Bismarck and Mandan School Crossing Safety Study; Bismarck and Mandan Bike & Pedestrian Plan; and the Downtown Mandan Subarea Study.

New studies that will commence in 2017 or 2018 will be the following: MPO Freight Plan, 2020-2045 Metropolitan Transportation Plan, MPO's Jurisdictions Alternative Funding Study, Archeological records search of South Beltway Bridge Area, and a Demographic Forecasting and Model performance Review.

Products: The product studies programmed for 2017 and 2018 are the following:

- Completion of the Bismarck and Mandan School Crossing Safety Study;
- Completion of the Bismarck and Mandan Bike Pedestrian Plan;
- Completion of the Downtown Mandan Subarea Study;
- MPO Freight Plan;
- 2020-2045 Metropolitan Transportation Plan;
- MPO's Jurisdictions Alternative Funding Study;
- Archeological records search of South Beltway Bridge Area;
- Demographic Forecasting and Model performance Review.

Completion Date:

While projects are scheduled to be completed in 2017 and 2018, not all projects may be completed in the year indicated. This may cause some projects to carry over into the 2019-2020 UPWP.

Estimated Expenditures:

	<u>2017</u>	<u>2018</u>
Planning Studies	\$627,500	\$375,000
TOTAL	627,500	375,000
Proposed Source of Funds:		
FHWA/FTA (80%)	502,000	300,000
Local (20%)	125,500	75,000
TOTAL	627,500	375,000

200.204.00

TRANSPORTATION PLAN STUDIES

(All Amounts in Dollars \$)

YEAR 2017

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	PROJECT PARTICIPATION
Bismarck	262,370	209,896	52,474	A,B,C,E,F,G
Mandan	254,465	203,572	50,893	A,B,C,D,E,F,G
Morton County	6,200	4,960	1,240	A,B,C,F
Burleigh County	37,200	29,760	7,440	A,B,C,F
Lincoln	6,200	4,960	1,240	A,B,C,F
Other*	61,065	48,852	12,213	E
TOTALS	627,500	502,000	125,500	

YEAR 2018

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	PROJECT PARTICIPATION
Bismarck	225,000	180,000	45,000	A,B,F,H,I,J
Mandan	75,000	60,000	15,000	A,B,F,H,I,J
Morton County	9,375	7,500	1,875	A,B,F,H,I,J
Burleigh County	56,250	45,000	11,250	A,B,F,H,I,J
Lincoln	9,375	7,500	1,875	A,B,F,H,I,J
Other	0	0	0	
TOTAL	375,000	300,000	75,000	

PLANNED STUDIES

- A--- ATAC Annual Fee (\$10,000) - yearly
- B--- Study Associated Modeling (\$68,000-2017 ; 40,000-2018) - yearly
- C--- Model review, enhancenment, & socio-economic projections(\$100,000) - 100%
- D--- Completion of Downtown Mandan Sub-Area Study(\$125,000) - 50%
- E---Completion of School Safety Crossing Study(\$147,600) - 65%
- F-- Freight Plan (\$140,000) -50% in 2017 & 50% in 2018
- G---Completion of Bike/Pedestrian Study (\$70,000) - 50%
- H---Metropolitan Transportation Plan (\$150,000) - 50%
- I---Alternative Funding Plan(\$100,000) - 100%
- J---Class 1 archeological search of available southern beltway bridge crossing (\$5,000) -100%

* Bismarck Public Schools

**205 TRANSPORTATION IMPROVEMENT PROGRAM
2017-2018**

Objective:

Prepare Transportation Improvement Program (TIP) for 2018 and 2019, as well as subsequent 2016 and 2017 TIP amendments that comply with MAP-21 regulatory requirements, and submit them to the North Dakota Department of Transportation.

Present Status:

A TIP has been prepared and approved annually since 1983. The MPO has an approved 2017-2020 TIP.

Proposed Work:

To develop a TIP in 2017 and 2018 that meets the requirements of MAP-21 and FAST Act . The TIPs will have projects that were prioritized and approved through coordination between the MPO, its member jurisdictions, and NDDOT. All MPO TIP projects will be financially constrained.

Product:

The 2018-2021 TIP and the 2019-2022 TIP

Completion Date:

Priority List Submission:	November 2016	November 2017
Draft TIP:	April 2017	April 2018
Final TIP:	July 2017	July 2018

Estimated Expenditures:

	<u>2017</u>	<u>2018</u>
TIP Development and Implementation	\$5,512	\$5,512
TOTAL	5,512	5,512

Proposed Source of Funds:

FHWA/FTA (80%)	4,410	4,410
Local (20%)	1,102	1,102
TOTAL	5,512	5,512

200.205.00

TRANSPORTATION IMPROVEMENT PROGRAM

(All Amounts in Dollars \$)

YEAR 2017

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck/Planning	5,512	4,410	1,102	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other	0	0	0	
TOTALS	5,512	4,410	1,102	

YEAR 2018

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck/Planning	5,512	4,410	1,102	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other	0	0	0	
TOTALS	5,512	4,410	1,102	

**206 TRANSIT STUDIES
2017-2018**

Objective:

To insure that the transportation needs of the elderly and physically challenged are being addressed through para-transit busing. To also meet transportation needs of the Bismarck-Mandan area by providing public transportation through fixed-route busing.

Present Status:

The active Transit Development Plan, “Mobility 2017” was developed in 2011/2012 and addressed the concerns of the current para-transit and fixed-route transit systems, and which alternatives are available and feasible to implement, that will allow the transit system to improve through 2017. The completed 2012 Transit Development Plan addressed many challenging questions to the transit system that are still being reviewed and analyzed for implementation.

Proposed Work:

To develop a Transit Development Plan for final approval by July 1, 2018.

Products:

A Transit Development Plan that can guide the metropolitan transit agency into 2018 and beyond.

Completion Date:

July 1, 2018

Estimated Expenditures:

	<u>2017</u>	<u>2018</u>
Consultant Services	\$70,000	\$70,000
TOTAL	70,000	70,000

Proposed Source of Funds:

FHWA/FTA (80%)	56,000	56,000
Local (20%)	14,000	14,000
TOTAL	70,000	70,000

200.206.00

TRANSIT STUDIES
(All Amounts in Dollars \$)

YEAR 2017

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	0	0	0	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other	70,000	56,000	14,000	
TOTALS	70,000	56,000	14,000	

YEAR 2018

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	0	0	0	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other*	70,000	56,000	14,000	
TOTAL	70,000	56,000	14,000	

* *Bis-Man Transit*

**207 AUXILLARY ACTIVITIES
(TRANSPORTATION ANALYSIS, DEMOGRAPHIC FORECASTING and MODEL
REVIEW)
2017-2018**

Objective:

To continually monitor the growth and development of the Bismarck-Mandan metropolitan area and its effects on land use, traffic flows, and the overall transportation system.

Present Status:

The Bismarck-Mandan MPO will need to analyze transportation trends for significant transportation modes for a variety of reasons including but not limited to transportation modeling and other transportation related efforts.

The latest MPO Long Range Transportation Plan was finalized in 2015, and an update to this Plan update is scheduled to begin in 2018. Continual work is required to maintain progress in the Plan development cycle, including acquisition/ collection and review of socio-economic (employment and consumer) data, development of demographic forecasting, an updating of the Transportation Analysis Zones (TAZ) boundaries, and review of the Transportation Demand Model.

Products:

Development of the Metropolitan Transportation Plan or MTP will begin in in 2018. Acquisition/collection and review of socio-economic data, as well as demographic forecasting, will occur in late 2016 and throughout 2017 prior to MTP development. Data review and forecast development will inform the updating of Transportation Analysis Zones (TAZ) boundaries, the development and review of the Transportation Demand Model (TDM or Model), and any other auxiliary activities for the MTP.

Estimated Expenditures:

	<u>2017</u>	<u>2018</u>
Analysis and Monitoring	\$6,087	\$6,087
TOTAL	6,087	6,087

Proposed Funding Sources:

FHWA/FTA (80%)	4,870	4,870
Local (20%)	1,217	1,217
TOTAL	6,087	6,087

200.207.00

207 AUXILLARY ACTIVITIES

(TRANSPORTATION ANALYSIS, DEMOGRAPHIC FORECASTING and MODEL REVIEW)

(All Amounts in Dollars \$)

YEAR 2017

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	6,087	4,870	1,217	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other	0	0	0	
TOTAL	6,087	4,870	1,217	

YEAR 2018

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	6,087	4,870	1,217	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other	0	0	0	
TOTAL	6,087	4,870	1,217	

PROGRAM IMPLEMENTATION

300

**301 GIS DEVELOPMENT AND IMPLEMENTATION
2017-2018**

Objective:

The Bismarck-Mandan Metropolitan Planning Organization (MPO) uses a MPO Geographic Information System (GIS) that provides access to a common digital geographic database for land use planning, zoning activities, traffic analysis, sewer/water projects and other related activities.

Present status:

Presently the following has been developed by GIS: MPO and Transportation Study information and data, Bismarck/Mandan Bike Trail, MPO TIP project and development maps, digital aerial photographs and aerial contours, and underground utility locations.

Proposed Work:

To continue to provide valuable map data and imagery concerning MPO projects in conjunction with all the partner entities. To assist MPO in census, transit, roadway, and bridge imagery, and other projects as needed.

Product:

Geographic Information System (GIS) for Bismarck-Mandan Area MPO. The products generated by GIS usage benefit the MPO a great deal.

Estimated Expenditures:

	<u>2017</u>	<u>2018</u>
GIS Production	\$10,000	\$10,000
TOTAL	10,000	10,000

Proposed Source of Funds:

FHWA/FTA (80%)	8,000	8,000
Local (20%)	2,000	2,000
TOTAL	10,000	10,000

300.301.00

GIS PROGRAM

(All Amounts in Dollars \$)

YEAR 2017

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	10,000	8,000	2,000	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other	0	0	0	
TOTALS	10,000	8,000	2,000	

YEAR 2018

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	10,000	8,000	2,000	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other	0	0	0	
TOTAL	10,000	8,000	2,000	

**302 CITIZEN PARTICIPATION PROGRAM
2017-2018**

Objective:

To establish procedures that provide for citizen input into the planning process as part of the development of the following: the MPO’s Metropolitan Transportation Plan (formerly Long Range Transportation Plan), the UPWP, the TIP and the DBE Program. The MPO will use this process to identify community issues regarding transportation planning and will consider these issues when developing programs within the MPO’s planning area.

Present Status:

As stipulated in MAP-21 and FAST Act, the UPWP, the DBE Program, the Public Participation Plan (PPP), the Long Range Transportation Plan and the TIP also receive public review at various levels during the development and update processes by the MPO.

Proposed Work:

To provide a citizen input forum for the MPO operational functional tools of TIP, UPWP, DBE Program, and the Metropolitan Transportation Plan (MTP), and applicable transportation studies as prescribed by MAP-21 and FAST Act, as well as an evaluation and update of the existing Public Participation Plan.

Product:

Ongoing program.

Estimated Expenditures:

	<u>2017</u>	<u>2018</u>
Advertising	6,318	6,318
Evaluation and Update of Public Participation Plan	1,000	0
TOTAL	7,318	6,318

Proposed Source of Funds:

FHWA/FTA (80%)	5,854	5,054
Local (20%)	1,464	1,264
TOTAL	7,318	6,318

300.302.00

CITIZEN PARTICIPATION

(All Amounts in Dollars \$)

YEAR 2017

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	7,318	5,854	1,464	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other	0	0	0	
	0	0	0	
	7,318	5,854	1,464	

YEAR 2018

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	6,318	5,054	1,264	
Mandan	0	0	0	
Morton County	0	0	0	
Burleigh County	0	0	0	
Lincoln	0	0	0	
Other	0	0	0	
	0	0	0	
TOTAL	6,318	5,054	1,264	

COST SUMMARIES APPENDIX

FY'S 2017-2018

**Unified Planning Work Program
Staff Allocation of Hours by Task
2017**

	PT Time Planner	Planner	Executive Director	Transportation Specialist
101: General Administration, Coordination and Liaison	418	1595	1840	1,973
102: Training, Travel, and Education	0	0	0	0
103: UPWP	0	0	0	0
104: Computer Enhancement and Software	0	0	0	0
105: Transit System Administration and Liaison	40	57	190	42
201: Performance Measures	0	262	20	0
202 Transportation Analysis and Monitoring	415	0	0	0
203: Socio-economic Projections- Monitoring and Forecasting	80	124	0	14
204: MPO and/or Local Planning Studies	0	0	0	0
205: Transportation Improvement Program	200	42	30	0
206: Transit Studies	0	0	0	0
207: Transportation Analysis and Monitoring	303	0	0	20
301: GIS Program	0	0	0	0
302: Citizen Participation	0	0	0	31
TOTAL	1456	2080	2080	2080

**Unified Planning Work Program
Staff Allocation of Hours by Task
2018**

	PT Time Planner	Planner	Executive Director	Transportation Specialist
101: General Administration, Coordination and Liaison	418	1498	1775	1984
102: Training, Travel, and Education	0	0	0	0
103: UPWP	0	97	65	20
104: Computer Enhancement and Software	0	0	0	0
105: Transit System Administration and Liaison	40	57	190	42
201: Performance Measures	0	262	20	0
202: Transportation Analysis and Monitoring	415	0	0	0
203: Socio-economic Projections- Monitoring and Forecasting	80	124	0	14
204: MPO and/or Local Planning Studies	0	0	0	0
205: Transportation Improvement Program	200	42	30	0
206: Transit Studies	0	0	0	0
207: Transportation Analysis and Monitoring	303	0	0	20
301: GIS Program	0	0	0	0
302: Citizen Participation	0	0	0	0
TOTAL	1456	2080	2080	2080

2017 - 2018 UNIFIED PLANNING WORK PROGRAM SUMMARY BY TASK

(All Amounts in Dollars \$)

TASK	FUNDING YEAR 2017				FUNDING YEAR 2018		
	Total	Federal	Local		Total	Federal	Local
101	286,940	229,552	57,388		287,438	229,950	57,488
102	16,500	13,200	3,300		16,500	13,200	3,300
103	-	-	-		7,000	5,600	1,400
104	3,300	2,640	660		3,800	3,040	760
105	14,429	11,543	2,886		14,429	11,543	2,886
201	9,404	7,523	1,881		9,404	7,523	1,881
202	8,324	6,659	1,665		8,324	6,659	1,665
203	6,058	4,846	1,212		6,058	4,846	1,212
204	627,500	502,000	125,500		375,000	300,000	75,000
205	5,512	4,410	1,102		5,512	4,410	1,102
206	70,000	56,000	14,000		70,000	56,000	14,000
207	6,087	4,870	1,217		6,087	4,870	1,217
301	10,000	8,000	2,000		10,000	8,000	2,000
302	7,318	5,854	1,464		6,318	5,054	1,264
Total	1,071,372	857,098	214,274		825,870	660,696	165,174

2017-20168 Unified Planning Work Program Summary By Jurisdiction

(All Amounts in Dollars \$)

YEAR 2017

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	636,242	508,994	127,248	
Mandan	254,465	203,572	50,893	
Morton County	6,200	4,960	1,240	
Burleigh County	37,200	29,760	7,440	
Lincoln	6,200	4,960	1,240	
Other	131,065	104,852	26,213	
TOTALS	1,071,372	857,098	214,274	

2017-2018 Unified Planning Work Program Summary By Jurisdiction

YEAR 2018

MPO ENTITY	TOTAL	FED 80%	LOCAL 20%	EXPLANATION
Bismarck	605,870	484,696	121,174	
Mandan	75,000	60,000	15,000	
Morton County	9,375	7,500	1,875	
Burleigh County	56,250	45,000	11,250	
Lincoln	9,375	7,500	1,875	
Other	70,000	56,000	14,000	
TOTALS	825,870	660,696	165,174	