GIAMPO – Policy Board

Tuesday, May 23, 2017 Regular Session

Item E2

Approval Recommendation of Final Draft Long Range Transportation Plan Amendment No. 2

In April 2016, the GIAMPO Policy Board approved Journey 2040, the Grand Island metropolitan region's Long Range Transportation Plan (LRTP). It is a blueprint that describes how the region will invest in its multimodal transportation system over the next 25 years. GIAMPO amends the LRTP to accommodate changes to projects in the LRTP. The proposed Amendment No. 2 to the LRTP adds one (1) Nebraska Department of Roads (NDOR) project, adjusts the anticipated project costs and/or funding sources for two (2) NDOR projects, and adjusts the fiscal constraint of the plan to include additional anticipated federal revenue. Amendment No.1 requires modifications (shown in red) in Chapter 7 – Financial Plan and Chapter 9 – Recommended Plan of the LRTP.

On April 10, 2017, the GIAMPO Technical Advisory Committee approved the recommendation of Final Draft LRTP Amendment No. 2. The amendment was made available for public comment for a thirty day period from April 12, 2017 to May 12, 2017.

Staff Contact: Allan Zafft, MPO Program Manager

GIAMPO RESOLUTION NO. 2017-5

Grand Island Area Metropolitan Planning Organization

A Resolution Amending the Long Range Transportation Plan "Journey 2040"

WHEREAS, the Grand Island Area Metropolitan Planning Organization (GIAMPO), is designated as the Metropolitan Planning Organization (MPO) for the Grand Island Urbanized Area, by the Governor acting through the Nebraska Department of Roads in cooperation with locally elected officials of the Grand Island Urbanized Area; and

WHEREAS, a Long Range Transportation Plan (LRTP) is required by the U.S. Department of Transportation (DOT) and was developed by the MPO for the Grand Island metropolitan area; and

WHEREAS, the GIAMPO Long Range Transportation Plan "Journey 2040" was approved by the MPO Policy Board on April 26, 2016. This plan provides a comprehensive plan to guide multimodal transportation improvements in the Grand Island metropolitan area over a 25-year planning horizon; and

WHEREAS, the GIAMPO Transportation Improvement Programs (TIP) for FY 2016-2020 and FY 2018-2022 are the MPO's five-year implementation programs and must be consistent with the Long Range Transportation Plan; and

WHEREAS, since the development of the GIAMPO Long Range Transportation Plan, the following project changes have occurred:

- State ID 41704 changing the project description and project length and significantly increasing the estimated costs
- State ID 42773 adding a federal funding source and changing from one federal funding category to another
- State ID 42787 adding a project with a federal funding source

The above projects changes are shown in Table 9-5 (in red) in the attached document; and

WHEREAS, the amendment has been made available for public comment for a thirty (30) day period and has been reviewed and recommended for adoption by the MPO Technical Advisory Committee (TAC), and now requires official approval from the MPO Policy Board; and

NOW, THEREFORE BE IT RESOLVED, that the Policy Board of the Grand Island Area Metropolitan Planning Organization approves and adopts the amendment to the MPO's Long Range Transportation Plan, replacing Chapter 7 and Chapter 9 of the Plan with the attached document.

Certification:

The	foregoing	resolution	was	approved	by	the	Grand	Island	Area	Metropolitan	Planning
Orga	nization Po	licy Board a	at its re	egularly sch	iedu	led m	eeting o	n May 2	23, 201	7.	

By:	Attest:
Jeremy Jensen, Mayor / Chairperson	John Collins, Public Works Director



Table 7-1: Total Available Roadway Funds (2016-2040)

	Total Available Roadway Funds (\$1,000)										
Time Period	Federal	State	Local	Total Revenues							
2016-2025	\$28,193	\$109,366	\$42,430	\$179,989							
2026-2040	TBD ⁹	\$169,495	\$89,952	\$259,447							
Total	\$28,193	\$278,861	\$132,382	\$439,436							

Table 7-2 on the following page shows the amount of funding available for constructing new projects after the costs for personnel, operations, maintenance, reconstruction, and equipment, plus projects that have already been programed, are subtracted. This funding balance is assumed to be available to construct new projects in the GIAMPO Area based upon a conservative forecast of future operations and maintenance costs and revenue generation. Assumptions relating to the forecasts and detailed tables are shown in Appendix C.

⁹ To Be determined (TBD): Federal revenue estimates for NDOR projects in the GIAMPO planning area will be determined as the MPO's needs are assessed and funding targets are established. At this time, NDOR is still assessing the need for specific projects of regional significance in the Grand Island Area MPO planning area for the period of 2020-2040. NDOR has established revenue projections within the timeframe of the NDOR Surface Transportation Program Book, a six-year document that outlines NDOR's projects and future expenditures. NDOR recognizes an ongoing and long-term need to monitor, evaluate and upgrade the state highway and interstate highway system in the Grand Island Area MPO planning area as well as the State of Nebraska at large. NDOR will continue to monitor the existing conditions and proposed future changes to the state highway system with the continuing cooperation, coordination and assistance of GIAMPO and local partners. As future needs are identified with regard to infrastructure condition, safety, roadway capacity or transit service, NDOR will work to address these needs and include them through update or amendment in the GIAMPO Long Range Plan, TIP and the NDOR Surface Transportation Program Book and STIP as required by State and Federal regulation.

Table 7-2: Funds Available for New Roadway Projects

New Roadway Project Revenue (\$1,000)								
Time	Total							
Period	Federal	Local / State	Revenues					
2016-2025	\$0	\$50,574	\$50,574					
2026-2040	TBD ¹⁰	\$113,236	\$113,236					
Total	\$0	\$163,810	\$163,810					

Funding for transit service was also examined through the 2040 horizon year. Transit service in the GIAMPO area is expected to continue but will be subject to the availability of local matching funds. A detailed breakdown of transit funding sources, assumptions and year-to-year forecasts for available revenue is shown in Appendix C. It is assumed that Grand Island will provide service only up to the budget that is available through a combination of Federal Transit funding and local matching dollars. A summary of the available transit revenue is shown below in Table 7-3.

Table 7-3: Transit Revenue and Expenditures (2016-2040)

Transit Revenue/Expenditure (\$1,000)									
Time Period	riod Federal Local / State Total R								
2016-2025	\$5,762	\$2,839	\$8,602						
2026-2040	\$11,193	\$5,765	\$16,958						
Total	\$16,956	\$8,604	\$25,560						

¹⁰ To Be determined (TBD): Federal revenue estimates for NDOR projects in the GIAMPO planning area will be determined as the MPO's needs are assessed and funding targets are established. At this time, NDOR is still assessing the need for specific projects of regional significance in the Grand Island Area MPO planning area for the period of 2020-2040. NDOR has established revenue projections within the timeframe of the NDOR Surface Transportation Program Book, a six-year document that outlines NDOR's projects and future expenditures. NDOR recognizes an ongoing and long-term need to monitor, evaluate and upgrade the state highway and interstate highway system in the Grand Island Area MPO planning area as well as the State of Nebraska at large. NDOR will continue to monitor the existing conditions and proposed future changes to the state highway system with the continuing cooperation, coordination and assistance of GIAMPO and local partners. As future needs are identified with regard to infrastructure condition, safety, roadway capacity or transit service, NDOR will work to address these needs and include them through update or amendment in the GIAMPO Long Range Plan, TIP and the NDOR Surface Transportation Program Book and STIP as required by State and Federal regulation.



Table 9-1: Total Available Roadway Revenue (2016-2040)

	Total Available Roadway Funds (\$1,000)										
Time Period	Federal	State	Local	Total Revenues							
2016-2025	\$28,193	\$109,366	\$42,430	\$179,989							
2026-2040	TBD ¹⁴	\$169,495	\$89,952	\$259,447							
Total	\$28,193	\$278,861	\$132,382	\$439,436							

Committed Costs

Committed projects are defined to include those projects currently programmed or now under construction. The first step in identifying the amount of funds available for new construction was to subtract the cost of these projects from the estimated total revenues from 2016 through 2040. A number of major projects have been programmed for the Grand Island area. Many of the committed projects are being completed by NDOR utilizing federal funding from a number of sources. The specific construction year and funding by source can be found in the GIAMPO Transportation Improvement Programs (TIP) 2016-2020 and 2018-2022.

Between 2016 and 20220, NDOR will complete a major reconstruction on I-80 in the GIAMPO study area, the reconstruction of U.S.-281 between U.S.-30 and Broadwell, and replacement of three bridges on U.S.-30. NDOR has also committed to construct a U.S.-30 west bypass from west of US-281 to near County Road 20 and then also install automated gates at I-80 interchanges. The total cost of these projects, shown in Table 9-2, is estimated at \$67 million.

¹⁴ To Be determined (TBD): Federal revenue estimates for NDOR projects in the GIAMPO planning area will be determined as the MPO's needs are assessed and funding targets are established. At this time, NDOR is still assessing the need for specific projects of regional significance in the Grand Island Area MPO planning area for the period of 2020-2040. NDOR has established revenue projections within the timeframe of the NDOR Surface Transportation Program Book, a six-year document that outlines NDOR's projects and future expenditures. NDOR recognizes an ongoing and long-term need to monitor, evaluate and upgrade the state highway and interstate highway system in the Grand Island Area MPO planning area as well as the State of Nebraska at large. NDOR will continue to monitor the existing conditions and proposed future changes to the state highway system with the continuing cooperation, coordination and assistance of GIAMPO and local partners. As future needs are identified with regard to infrastructure condition, safety, roadway capacity or transit service, NDOR will work to address these needs and include them through update or amendment in the GIAMPO Long Range Plan, TIP and the NDOR Surface Transportation Program Book and STIP as required by State and Federal regulation.





Table 9-2: Committed Project Cost

	Com	mitted Project Cos	t (\$1,000)	
Time Period	Federal	State	Local	Total Costs
2016-2025	\$28,193	\$33,088	\$5,925	\$67,206

Note: Project Costs have been inflated to Year of Expenditure by sponsoring jurisdictions at a 4 percent increase per year per US DOT recommendations.

Operation & Maintenance & Reconstruction Costs

The City of Grand Island and Hall County in the GIAMPO study area have an annual Operation and Maintenance budget to maintain the existing transportation infrastructure. It includes personnel, equipment, and materials cost of maintenance. It also includes funds for more extensive maintenance projects such as resurfacing, replacing curbs, signs, signal maintenance, and other similar activities.

NDOR contracts with the local governments to complete routine maintenance. Table 9-3 presents the combined local and state maintenance costs. Operation and Maintenance costs, also presented in Table 9-3, were projected for the next 25 years. These costs are shown on an annual basis in Appendix C. In addition, a general estimate of reconstruction costs for projects not yet determined was included in these cost estimates. The funds for operations, maintenance, and reconstruction are shown in Table 9-3. The inflation rate for the future year of expenditure is based upon past trends for each specific line item. These assumptions and rates are documented in Appendix C.

Table 9-3: Operation and Maintenance Budget

Operation & Maintenance Expenditures (\$1,000)							
	Local Operation &						
Time Period	Maintenance						
2016-2025	\$62,209						
2026-2040	\$146,211						
Total	\$208,420						

Table 9-4 on the following page shows the remaining funds available after committed project costs, operations and maintenance costs are subtracted from the total revenues. In summary, the table shows anticipated revenues for available for programming new construction projects in the GIAMPO area for the remaining portion of the plan.



Table 9-4: Available Roadway Revenue

	Available New Project Revenue (\$1,000)									
Time	Federal	Local / State	Total							
Period	reuerai	Local / State	Revenue							
2016-2025	\$0	\$50,574	\$50,574							
2026-2040	TBD ¹⁵	\$113,236	\$113,236							
Total	\$0	\$163,810	\$163,810							

9.2 Project Priority Process

The projects were evaluated and prioritized based upon the funds and in what time period the project would be proposed. This process took three steps: project evaluation, public input, and MPO Technical Committee review.

Project Evaluation

Each of the proposed projects presented in the Long-Range Transportation Plan was evaluated based on the GIAMPO 2040 project goals and evaluation criteria presented in Chapter 3. Each criterion was transparent. Base factors and criteria were developed for each project goal. A composite score was calculated for each project based on the goal score multiplied by the goal weight, which was developed as part of the public involvement process. The priorities are discussed in Chapter 5, with detailed project scoring shown in the Appendices.

Public Input

Public input was sought on project priorities. As part of the second public meeting, participants scored a high, medium, or low prioritization to each project type. They also provided input on specific projects

NDOR will continue to monitor the existing conditions and proposed future changes to the state highway system with the continuing cooperation, coordination and assistance of GIAMPO and local partners. As future needs are identified with regard to infrastructure condition, safety, roadway capacity or transit service, NDOR will work to address these needs and include them through update or amendment in the GIAMPO Long Range Plan, TIP and the NDOR Surface Transportation Program Book and STIP as required by State and Federal regulation.

¹⁵ To Be determined (TBD): Federal revenue estimates for NDOR projects in the GIAMPO planning area will be determined as the MPO's needs are assessed and funding targets are established. At this time, NDOR is still assessing the need for specific projects of regional significance in the Grand Island Area MPO planning area for the period of 2020-2040. NDOR has established revenue projections within the timeframe of the NDOR Surface Transportation Program Book, a six-year document that outlines NDOR's projects and future expenditures. NDOR recognizes an ongoing and long-term need to monitor, evaluate and upgrade the state highway and interstate highway system in the Grand Island Area MPO planning area as well as the State of Nebraska at large.

Journey 2040



Table 9-5: Fiscally Constrained Project Plan

		Grand Island Area	a MPO Tra	nsportatio	on Improveme	ent Program FY	2016-202	0 / FY 2018-2022		
State ID	Project Name	Project Description	A/Q Status	Length (SLM)	Total Project Est.	Phase	YOE	Fund Type	Fund Description	TIP Estimate by Phase Amount (\$1,000)
						PE	2016	City	Grand Island	\$153
						PE	2016	State	Build Nebraska	\$2,057
						ROW	2017	City	Grand Island	\$47
		4 lane divided roadway on new				ROW	2017	State	Build Nebraska	\$2,092
		alignment				Const/CE	2020	City	Grand Island	\$2,465
	US-281 West,	US-30 from 1.4 mi west of Grand Island							D 111	
41704	Grand Island	to 0.4 mi west of US-281, Begin Ramp - 308.64	Exempt	3.9 mi	\$29,681	Const/CE	2020	State	Build Nebraska	\$22,867
						PE	2017	State	NDOR	\$31
						ROW	2018	State	NDOR	\$1
	Platte	Mill, Concrete repair, resurface 4-lane dual Roadway and Shoulders, Bridge repair				Const/CE	2019	NHPP	National Highway Performance Program	\$7,300
42674	River - Phillips	I-80 from Platte River west of Grand to Phillips, Beginning RP - 310.88	Exempt	7.7 mi	\$8,144	Const/CE	2019	State	NDOR	\$812

Journey 2040

A Long-range Transportation Plan FOR GRAND ISLAND

State ID	Project Name	Project Description	A/Q Status	Length (SLM)	Total Project Est.	Phase	YOE	Fund Type	Fund Description	TIP Estimate by Phase Amount (\$1,000)
						PE	2015	State	NDOR	\$779
						Const/CE	2017	City	Grand Island	\$3,126
		Resurf existing roadway & US- 281/N-2 ramps, concrete repair, brdge repair, add subdrains				Const/CE	2017	NHPP	National Highway Performance Program	\$11,450
	In Grand Island	US-281 from Old US-30 Viaduct over UPRR, North to 1.8 mi South of Howard County Line				Const/CE	2017	SFTY	Nation Safety Improve. Program	\$585
42690	& North	Beginning RP - 68.90	Exempt	9.6 mi	\$18,707	Const/CE	2017	State	NDOR	\$2,767
						PE	2016	State	NDOR	\$39
						Const/CE	2017	EM	Earmark	\$355
	Grand Island -	Deploy automated gate systems and CCTV Cameras Several I-80 interchanges in				Const/CE	2017	NHPP	National Highway Performance Program	\$949
42773	WACO	District 4	Exempt	0	\$1,537	Const/CE	2017	State	NDOR	\$194
	In Grand Island	Bridge repair/overlay,sealing, approach slabs Three Bridges in Grand Island				Const/CE	2018	NHPP	National Highway Performance Program	\$2,339
42776	Bridges	Beginning RP - 312.93	Exempt	0	\$2,924	Const/CE	2018	State	NDOR	\$585

Journey 2040

A Long-range Transportation Plan FOR GRAND ISLAND

State ID	Project Name	Project Description	A/Q Status	Length (SLM)	Total Project Est.	Phase	YOE	Fund Type	Fund Description	TIP Estimate by Phase Amount (\$1,000)
						PE	2016	SFTY	Nation Safety Improve. Program	\$100
						PE	2016	Local	Grand Island	\$10
	Grand Island - Stolley Park	Reconfigure Stolley Park Road to 3,4 and 5 lane sections - FHWA Road Diet Initiative				Const./CE	2017	SFTY	Nation Safety Improve. Program	\$1,115
42812	Reconfiguration	From Webb Road to S. Locust St	Exempt	2.04 mi	\$1,349	Const./CE	2017	Local	Grand Island	\$124
						PE	2016	State	NDOR	\$1
						Const/CE	2016	State	NDOR	\$111
42828	District 4 - Districtwide striping	Install durable pavement markings	Exempt	0	\$1,110	Const/CE	2016	SFTY	Nation Safety Improve. Program	\$998
							2016	FTA	Sec. 5307	\$100
	Transit Needs Analysis	Feasibility Study to identify Transit Needs	Exempt		\$125		2016	Local	Grand Island	\$25
						PE	2019	State	NDOR	\$1
	Cairo - Grand	Resurfacing N-2 from Cairo southeast to US- 281 in Grand Island, Begin RP -				Const/CE	2022	NHPP	National Highway Performance Program	\$3,002
42787	Island	343.73	Exempt	12.3 mi	\$3,754	Const/CE	2022	State	NDOR	\$751
									Total	\$67,331





Table 9-5: Fiscally Constrained Project Plan (Continued)

GIAMPO Project Listing 2021-2025									
Project ID	Project Name	Project Description	From	То	Jurisdiction	Total Cost (\$1,000) Current Year	Total Cost (\$1,000) Future Year	Available Fiscal Constrained (\$1,000)	
	2016 - 2025								
	Intersection Improvements	Improvements at various intersections	Various	Various	Grand Island	\$3,500	\$4,606	\$45,968	
B-3a	Stuhr Road	Widen to 3 lanes	US-30	BNSF RR	Grand Island	\$9,656	\$12,707	\$33,261	
B-2a	Old Potash Highway	Widen to 5 lanes	Claude Road	Webb Road	Grand Island	\$4,307	\$5,668	\$27,593	
B-8	Husker Highway	Widen to 3 lanes	US-281	North Road	Grand Island	\$4,947	\$6,510	\$21,083	
B-7	Stolley Park Road	Widen to 3 lanes	Fair Ground Entrance	Stuhr Road	Grand Island	\$2,183	\$2,872	\$18,211	
В-1а	Capital Avenue	Widen to 5 lanes	Broadwell Avenue	BNSF RR/Oak Street	Grand Island	\$3,438	\$4,524	\$13,687	
В-6	13th Street	Widen to 3 lanes	West of US-281	Independence Avenue	Grand Island	\$4,193	\$5,517	\$8,170	
					Total 2021-2025	\$32,224	\$42,404	\$8,170	



Table 9-5 Fiscally Constrained Project Plan continued

Project ID	Project Name	Project Description	From	То	Jurisdiction	Total Cost (\$1,000) Current Year	Total Cost (\$1,000) Future Year	Available Fiscal Constrained (\$1,000)
2026-2040							\$121,406*	
B-4	North Road	Widen to 3 lanes	Highway 2	Old Potash Highway	Grand Island	\$11,081	\$14,582	\$106,824
	Intersection Improvements	Improvements at various intersections	Various	Various	Grand Island	\$3,764	\$7,332	\$99,492
2	Stuhr Bridges over BNSF and UPRR	Engineering			Grand Island	\$2,048	\$3,989	\$95,503
B-3b	Stuhr Road	Widen to 3 lanes	BNSF RR	US-34	Grand Island	\$9,656	\$18,809	\$76,694
B-1b	Capital Avenue	Widen to 3 lanes	BNSF RR/Oak Street	St Paul Road	Grand Island	\$1,781	\$3,470	\$73,224
B-1c	Capital Avenue	Widen to 3 lanes	Dairy Queen	Engleman Road	Grand Island	\$5,700	\$11,103	\$62,121
B-2b	Old Potash Highway	Widen to 3 lanes	Engleman Road	Claude Road	Grand Island	\$5,269	\$10,264	\$51,857
B-5	Swift Road	New 2-lane road	Talc Road	Shady Bend Road	Grand Island	\$3,150	\$6,136	\$45,721
4	Broadwell over UPRR and	Broadwell Avenue Widening (5-lane)	Faidley Avenue	Third Street		\$3,900	\$7,597	\$38,124
5	Broadwell	Broadwell UPRR bridge			Grand Island	\$13,000	\$25,323	\$12,801
6	Extension	Broadwell Extension (3-lane)	Anna Street	Adams Street		\$4,900	\$9,545	\$3,256
6			Anna Street		otal 2026-2040	. ,	. ,	

^{*}Note: includes \$8,170 of FY2016-2025 carryover plus forecast \$113,236.



Table 9-6: Illustrative Project Plan

			GIAMPO Illustrative Proj	ects					
Project ID	Project Name	Project Description	From	То	Jurisdiction	Total Cost (\$1,000) Current Year	Total Cost (\$1,000) Future Year	Available Fiscal Constrained (\$1,000)	
Illustrative Project 2040+									
11	13th St. – 10th St. Connector	Reconstruct	W 13th Street	10th Street	Grand Island	\$600	\$992		
7	North Road and UPRR Bridge	Widen to 3 lanes; new 2-lane bridge	Old Potash Hwy	Husker Hwy	Grand Island	\$16,200	\$26,776		
9	Broadwell over BNSF	Widen to 5 lanes Realign Old Highway 2 to connect Custer Avenue; New 4-lane bridge	Capital Avenue	Airport Road	Grand Island	\$14,300	\$23,636		
3	Eddy Street Extension	New 2-lane Road	Phoenix Avenue	Locust Street	Grand Island	\$3,300	\$5,454		
12	Alda Road and UPRR Bridge	New 2-lane bridge	Apollo Street	Hwy 30	Grand Island	\$11,300	\$18,677		
	East Bypass (5- lanes)	5-lane Stolley Park Road *	Locust Street	Stuhr Road	Grand Island	\$2,500	\$4,132		
15		5-Lane Stuhr Road / Sky Park Road *	US-34	Capital Avenue		\$11,875	\$19,628		
		5-lane Husker Hwy	US-281	Stuhr Road		\$18,750	\$30,991		
		5=lane Captial Avenue	BNSF RR/Oak Street	Sky Park Road		\$20,375	\$33,677		
16	East Bypass US- 281 to I-80	4-lane Expressway	I-80	US 281	Grand Island	\$78,750	\$130,162		
2	Stuhr Road bridge over UPRR	New 4-lane bridges	– Highway 30	ALL CL	Grand Island	\$15,952	\$26,366		
2	Stuhr Road bridge over BNSF	New 4-lane bridge		4th Street	Grand Island	\$11,000	\$18,181		

^{*}expand 3-lane to 5-lane