



Program Review

Federal Highway
Administration



Federal Transit
Administration

Certification Review of the Des Moines Area Metropolitan Planning Organization (DMAMPO) Transportation Planning Process

July 11, 2013



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Executive Summary

Certification Action

As per the language in 23 CFR 450.334(b)(1)(ii), it has been determined that the transportation planning process in the Des Moines metropolitan area substantially meets the requirements of this part and a TIP has been approved by the MPO and the Governor and is certified with conditions. The FHWA and FTA jointly certify the transportation planning process through July 11, 2017 subject to the following **corrective action**:

Corrective Action

1. **Congestion Management Process:** The Des Moines Area MPO does not have an approved Congestion Management Process (CMP) that meets the requirements of 23 CFR 450.320.
 - **Resolution:** The Des Moines Area MPO needs to adopt a CMP that adheres to the eight step CMP approach.
 - **Action Plan:** A compliant CMP shall be approved by January 1, 2014.

Recommendations

While the recommended actions described below are not required as part of this Certification Review, their implementation would improve the overall transportation planning process in a way that is consistent with the spirit and intent of federal requirements.

1. Organizational Framework:
 - It is recommended that the MPO the Iowa DOT, and local public agencies continue to increase cooperation and coordination, the clear delineation of roles in the areas of project planning and development, sharing of data, and assuring there is a common long-range vision for the region.
2. Metropolitan Transportation Plan:
 - It is recommended that the MPO consider making the next MTP more user-friendly and readable for the general public. A summary document, poster, or other such handout could be used to convey the highlights of the plan.
3. Public Involvement:
 - It is recommended that the MPO's Public Participation Plan be updated to reflect the new address of MPO Office and any changes to the public involvement process that have taken place since the current Public Participation Plan was adopted in 2010.



4. Title VI, Environmental Justice, Limited English Proficiency:
 - It is recommended that the MPO collect data to assist in determining that the public involvement process is non-discriminatory, and that a nondiscrimination policy statement and Title VI information is made available.
 - It is recommended that the MPO ensure that their public participation process includes methods for outreach to and services offered to the LEP population and a method to document services and evaluate.
 - It is recommended that the MPO document a complaint disposition process for Title VI/Nondiscrimination complaints. It is also recommended that the Title VI Coordinator contact information, along with their complaint procedures, be made readily available to the public.
5. Travel Forecasting:
 - It is recommended that the Des Moines Area MPO retain the ability to perform modeling work.
 - It is recommended to further analyze the level of transit analysis required by the MPO, and then either build that functionality into the model or find a surrogate methodology to fill that need.
 - Additional technical recommendations are included in the Travel Forecasting section of this document.
6. Congestion Management and Operations:
 - It is recommended that the MPO establishes a maintenance plan for their ITS architecture.

Commendations

The review team commends the Des Moines Area MPO for the following areas of progress:

1. The planning agreement between DART and the MPO is a best practice regarding its delineation of short term (DART) and longer term (MPO) planning work activities included in the Unified Planning Work Program.
2. The upcoming rollout of the final Tomorrow Plan represents three years of sustainable planning by the Des Moines MPO and shows a commitment by the MPO to include sustainable planning as part of the metropolitan area's long range transportation planning.
3. The allocation of FHWA STP funds for transit projects is noteworthy. Of the annual \$11-12 million STP attributable allocation to the Des Moines MPO, approximately \$1 million (approximately 8%) is allocated to fund capital transit



projects, such as DART vehicle acquisitions. The MPO's support of transit with such sizable transfers for transit vehicles is a best practice.

4. Since the last review, the Des Moines Area MPO has conducted a large number of public meetings across the entire metropolitan area, and beyond their traditional meeting location of the Botanical Gardens.
5. The Quick Clearance Guidelines is a best practice for Region VII metropolitan areas.



Background

Pursuant to 23 U.S.C. 134(k) and 49 U.S.C. 5303(k), the Federal Highway Administration (FHWA) and the Federal Transit Administration (FTA) must jointly certify the metropolitan transportation planning in Transportation Management Areas (TMAs) at least every four years. A TMA is an urbanized area, as defined by the U.S. Census Bureau, with a population of over 200,000. There are 179 TMAs in the United States, according to the 2010 Census. In general, the reviews consist of three primary activities: a site visit, a review of planning products (in advance of and during the site visit), and preparation of a report that summarizes the review and offers findings. The reviews focus on compliance with Federal regulations, challenges, successes, and experiences of the cooperative relationship between the Metropolitan Planning Organization (MPO), the State DOT, and transit operators in the conduct of the metropolitan planning process. Joint FTA/FHWA Certification Review guidelines provide agency field reviewers with latitude and flexibility to tailor the review to reflect local issues and needs. As a consequence, the scope and depth of the Certification Review reports will vary significantly.

Purpose and Objective

The Certification Review process is only one of several methods used to assess the quality of a local metropolitan planning process, compliance with applicable statutes and regulations, and the level and type of technical assistance needed to enhance the effectiveness of the planning process. Other activities provide opportunities for this type of review and comment, including Unified Planning Work Program (UPWP) approval, the Metropolitan Transportation Plan (MTP), metropolitan and statewide Transportation Improvement Program (TIP) findings, air-quality conformity determinations (in nonattainment and maintenance areas), as well as a range of other formal and less formal contact provide both FHWA/FTA an opportunity to comment on the planning process. The results of these other processes are considered in the Certification Review process.

While the Planning Certification Review report itself may not fully document those many intermediate and ongoing checkpoints, the “findings” of Certification Review are, in fact, based upon the cumulative findings of the entire review effort.

The review process is individually tailored to focus on topics of significance in each metropolitan planning area. Federal reviewers prepare Certification Reports to document the results of the review process. The reports and final actions are the joint responsibility of the



appropriate FHWA and FTA field offices, and their content will vary to reflect the planning process reviewed, whether or not they relate explicitly to formal “findings” of the review.

Scope and Methodology

A Certification Review of the transportation planning process for the Des Moines metropolitan planning area was performed by FHWA and FTA on April 29 – May 1, 2013. The review was conducted at the offices of the Des Moines Area MPO, in Des Moines, Iowa. An updated set of Certification Review guidelines was developed for this review. These guidelines, in the form of a list of questions, were provided to the Des Moines Area MPO, the Iowa Department of Transportation (Iowa DOT), and Des Moines Area Regional Transit (DART) and were attached to the notification letter dated January 22, 2013). The MPO staff provided very detailed and informative responses to the Federal Team’s questionnaire prior to the Certification Review.

As part of the review, a public hearing was held at 6:00 p.m. on April 29, 2013. The federal team presented and discussed the purpose and requirements of the certification review and opened the floor for any questions or discussion of the attendees at the meeting.

Team Members

Federal reviewers prepared this Certification Review report to document the results of the review process. The report and final actions are the responsibility of the FHWA Iowa and FTA Region 7 Office. The Federal Review Team included:

- Mr. Tracy Troutner, FHWA, Iowa Division
- Mr. Mark Bechtel, FTA, Region 7 Office
- Mr. Ed Christopher, FHWA, Resource Center
- Ms. Kim Anderson, FHWA, Iowa Division
- Mr. Jerry Roche, FHWA Iowa Division

Those participating in the Des Moines Area MPO Certification Review also included staff from the Des Moines Area MPO, Iowa DOT, and DART.



Observations and Findings

Each section under Observations and Findings is outlined in the following format:

- **Regulatory Basis** – The regulatory basis defines where information regarding each planning topic can be found in the Code of Federal Regulations (CFR) and/or the United States Code – the “Planning Regulations” and background information on the planning topic
- **Observations** – Observations describe the current status for each planning topic
- **Finding** – The finding section summarizes the compliance determination for each planning topic or issue and provides the primary basis for determining the recommendations, commendations, and/or corrective actions.
 - **Corrective Actions (if applicable)** – Corrective Actions are compliance issues and indicate a serious situation that fails to meet one or more requirements of the transportation planning statute and regulations, thus seriously impacting the outcome of the overall process. The expected outcome is a change that brings the metropolitan planning process into compliance with a planning statute or regulation; failure to respond will likely result in a more restrictive certification.
 - **Recommendations (if applicable)** – Recommendations address technical improvements to processes and procedures, that while somewhat less substantial and not regulatory, are still significant enough that FHWA and FTA are hopeful that State and local officials will take action. The expected outcome is change that would improve the process, though there is no Federal mandate.
 - **Commendations (if applicable)** – Commendations are processes or practices that demonstrate innovative, highly effective, well-thought out procedures for implementing the planning requirements. Elements addressing items that have frequently posed problems nationwide could be cited as commendations. Also, significant improvements and/or resolution of past findings may warrant a commendation.
- **Resolution (if applicable)** – A resolution identifies the actions that will be (or have been) taken in response to a corrective action.



Organizational Framework

Regulatory Basis: In regard to agency cooperation, there are several areas that indicate the need for cooperation between the MPO and the state DOT, including:

Title 23 Section 134 (c) (1) states: “Development of long-range plans and tips. - To accomplish the objectives in subsection (a), metropolitan planning organizations designated under subsection (d), in cooperation with the State and public transportation operators, shall develop long-range transportation plans and transportation improvement programs through a performance-driven, outcome-based approach to planning for metropolitan areas of the State.”

Title 23 Section 135 (f) (2) (A) states: “The statewide transportation plan shall be developed for each metropolitan area in the State in cooperation with the metropolitan planning organization designated for the metropolitan area under section 134.”

Title 23 Section 135 (g) (2) (A) states: “With respect to each metropolitan area in the State, the program (STIP) shall be developed in cooperation with the metropolitan planning organization designated for the metropolitan area under section 134.”

In regard to planning agreements, 23 CFR 450.314(a) states: “The MPO, the State(s), and the public transportation operator(s) shall cooperatively determine their mutual responsibilities in carrying out the metropolitan transportation planning process. These responsibilities shall be clearly identified in written agreements among the MPO, the State(s), and the public transportation operator(s) serving the MPA.”

Observations: In regard to agency cooperation, it was observed that project-level decisions have not been fully communicated and coordinated between jurisdictions, resulting in lost costs for unnecessary design elements (i.e. design of lighting, relocation of infrastructure for Grand Avenue/I-35) and conflicting future development plans (i.e. Morningside Bridge alignment). It was also observed that there is a disconnect between the Iowa DOT and the MPO involving the sharing of data from the Traffic Management Center.

The coordination of long range planning efforts was observed to be a potential future issue. As the Tomorrow Plan comes to completion and its' framework is utilized for the MPO's MTP, it will contain long range goals that will be used to shape the growth and direction of the region. It is conceivable that the plans and direction of the region may be in conflict with the plans and needs of the State/NHS system.



In regard to planning agreements, it was observed that an updated planning agreement exists between the MPO and the transit provider (DART). It was also observed that the Iowa DOT is providing an ever increasing role in the development of the MPO travel demand model, but there is no written planning agreement in place for these coordination efforts.

Finding: The Des Moines Area MPO's organizational framework is compliant with the federal planning regulations.

Recommendations: It is recommended that the MPO assess the effectiveness of its' organizational structure. It is also recommended that the MPO, the Iowa DOT, and local public agencies continue to increase cooperation and coordination, the clear delineation of roles in the areas of project planning and development, sharing of data, and assuring there is a common long-range vision for the region.

Commendation: The planning agreement between DART and the MPO is a best practice regarding its delineation of short term (DART) and longer term (MPO) planning work activities included in the Unified Planning Work Program.

Unified Planning Work Program

Regulatory Basis: A UPWP covers one to two years and typically contains several elements. According to 23 CFR 450.308 "each MPO, in cooperation with the State(s) and public transportation operator(s), shall develop a UPWP that includes a discussion of the planning priorities facing the MPA. The UPWP shall identify work proposed by major activity and task (including activities that address the planning factors in §450.306(a)), in sufficient detail to indicate who (e.g., MPO, State, public transportation operator, local government, or consultant) will perform the work, the schedule for completing the work, the resulting products, the proposed funding by activity/task, and a summary of the total amounts and sources of Federal and matching funds."

Observations: During the review of the current draft FY 2014 UPWP document, it was observed that the UPWP has no discussion of the planning priorities and issues facing the Des Moines Area MPO region or a listing of the planning factors. While the document listed all the planning work elements to be completed in the region, it did not articulate "why" the work was being done.

Finding: The Des Moines Area MPO UPWP does not meet all the requirements listed under 23 CFR 450.308.



Resolution: The Des Moines Area MPO's 2014 UPWP has since been updated to include a summary of the transportation issues and resultant planning priorities within the MPO planning area, so this item will not be listed as a corrective action.

Metropolitan Transportation Plan

Regulatory Basis: In regard to the Metropolitan Transportation Plan, 23 CFR 450.322 states "The metropolitan transportation planning process shall include the development of a transportation plan addressing no less than a 20-year planning horizon... the transportation plan shall include both long-range and short-range strategies/actions that lead to the development of an integrated multimodal transportation system to facilitate the safe and efficient movement of people and goods in addressing current and future transportation demand."

Observations: It was observed that the current plan is a very extensive document including much narrative, maps, charts, tables, and supporting documentation. In total, the digital copy of the MTP is 408 pages in length.

The current MTP has a horizon year of 2035 and expires September 17, 2014. As the September 2014 date approaches, much work will need to be completed in order assure that the plan is adopted on time. The Tomorrow Plan's selected preferred alternative, findings, and vision will be the foundation to the travel demand model and the horizon year 2040 plan.

Finding: The Des Moines Area MPO's Metropolitan Transportation Plan meets the requirements of 23 CFR 450.322.

Recommendations: It is recommended that the MPO consider making the next MTP more user-friendly and readable for the general public. A summary document, poster, or other such handout could be used to convey the highlights of the plan.

Commendation: The upcoming rollout of The Tomorrow Plan represents three years of sustainable planning by the Des Moines MPO and shows a commitment by the MPO to include sustainable planning as part of the metropolitan area's long range transportation planning.

Transportation Improvement Program

Regulatory Basis: According to 23 CFR 450.324, the MPO shall cooperatively develop a TIP that is consistent with the MTP and is financially constrained. The TIP must cover at least a four-year horizon and be updated at least every four years. Additionally, the TIP must list all



projects in sufficient detail outlined in the regulations, reflect public involvement, and identify the criteria for prioritizing projects.

Observations: It was observed that the Des Moines Area MPO has a well-established system for project selection. The MPO annually solicits STP and TAP project applications from member governments and participating agencies and conducts technical scoring, with assistance of MPO subcommittees, to determine project eligibility. Scores are computed on a scale of 0-100, with those scoring 50 points or higher being deemed eligible. Project eligibility and consistency with the MTP is checked during this process as well.

Finding: The Des Moines Area MPO's TIP meets the requirements of 23 CFR 450.322.

Commendation: The allocation of FHWA STP funds for transit projects is noteworthy. Of the annual \$11-12 million STP attributable allocation to the Des Moines MPO, approximately \$1 million (approximately 8%) is allocated to fund capital transit projects, such as DART vehicle acquisitions. The MPO's support of transit with such sizable transfers for transit vehicles is a best practice.

Public Involvement

Regulatory Basis: 23 CFR 450.316 sets forth the primary requirements for public involvement, including the development of a Public Participation Plan. Public involvement in connection with the MTP is specifically addressed in 23 CFR 450.322 (g) (1) (2), (i), and (j) and specifically for the TIP in 23 CFR 450.324 (b).

Observations: It was observed that, since the previous review, public outreach and participation has increased. The MPO has held public involvement meetings in every MPO member community, and has coordinated with neighborhood organizations, chambers of commerce, churches, community centers, and have joined with other meetings that were already scheduled. The development of The Tomorrow Plan has also accounted for over 150 public involvement meetings over the past two and a half years. Public meetings have been held at events and locations that are served by transit (sometimes at Roosevelt High School) to draw attendance from low income/minority neighborhoods. The MPO has coordinated with agencies that work directly with low income/minority groups in order to foster additional public involvement.

Finding: The Des Moines Area MPO's public involvement efforts and public participation plan are compliant with the federal planning regulations.



Recommendation: It is recommended that the MPO’s Public Participation Plan be updated to reflect the new address of MPO Office and any changes to the public involvement process that have taken place since the current Public Participation Plan was adopted in 2010.

Commendation: Since the last review, the Des Moines Area MPO has conducted a large number of public meetings across the entire metropolitan area, and beyond their traditional meeting location of the Botanical Gardens.

Title VI, Environmental Justice, Limited English Proficiency

Regulatory Basis: Title VI of the Civil Rights Act of 1964 states that “no person in the United States shall, on the ground of race, color, or national origin be excluded from participation in, be denied the benefits of, or subjected to discrimination under any program or activity receiving Federal financial assistance.” Title VI bars intentional discrimination as well as disparate impact on protected groups.

The federal transportation planning regulations, noted under 23 CFR 450.316(a)(1)(vii), requires that the MPO seek out and consider the needs of those traditionally underserved by existing transportation systems, such as low-income and minority households, who may face challenges accessing employment and other services. Furthermore, 23 CFR 450.334(a) (1)-(10) outline applicable nondiscrimination requirements to which an MPO must self-certify.

The Executive Order 12898, issued in 1994, amplifies the Title VI provisions. It states that each federal agency shall make achieving environmental justice (EJ) part of its mission by identifying and addressing, as appropriate, disproportionately high and adverse human health or environmental effects of its programs, policies, and activities on minority populations and low-income populations.

Executive Order 13166, Improving Access for Persons with Limited English Proficiency, was executed in 2000 to improve access to federally-conducted and federally assisted programs and activities for persons who, as a result of national origin, are limited in their English proficiency (LEP). It requires Federal agencies to ensure that recipients of Federal financial assistance provide meaningful access to their LEP applicants and beneficiaries.

Finally, 23 CFR 200.9(b)(3) directs State Transportation Agencies (STAs) to develop a prompt complaint disposition process while 23 CFR 200.9(b)(7) directs the STAs to conduct Title VI/Nondiscrimination reviews of sub-recipients, which include Metropolitan Planning Organizations.



Observations: It was observed that the MPO is in the process of developing a methodology to determine the impacts to low and moderate income (LMI) populations. The MPO knows the locations of LMI populations and the transportation projects, but they have not determined if transportation projects help or hurt the LMI population. The MPO is working to develop the 'degrees of disadvantage' to determine if a project helps or hurts a neighborhood. Determining the needs of the community is the first step, and it is recommended that the MPO review the FHWA's Community Impact Assessment for this particular exercise.

It has been noted that the MPO website contains the following statement: "The MPO receives federal funding and may not discriminate against anyone on the basis of race, color, or national origin, according to Title VI of the Civil Rights Act of 1964. For more information or to obtain a Title VI complaint form, please call (515) 334-0075." However, during the site review it was observed that the MPO does not have a complaint disposition process documented for complaints arising from its planning process regarding Title VI/Nondiscrimination.

Finding: The Des Moines Area MPO meets the requirements of Title VI, Environmental Justice, Limited English Proficiency.

Recommendations: It is recommended that the MPO collect data to assist in determining that the public involvement process is non-discriminatory, and that a nondiscrimination policy statement and Title VI information is made available.

It is recommended that the MPO ensure that their public participation process includes methods for outreach to and services offered to the LEP population and a method to document services and evaluate.

It is recommended that the MPO document a complaint disposition process for Title VI/Nondiscrimination complaints. It is also recommended that the Title VI Coordinator contact information, along with their complaint procedures, be made readily available to the public.

Travel Forecasting

Regulatory Basis: Federal transportation planning legislation requires each metropolitan planning organization (MPO) to develop a transportation plan as part of its planning process [23 U.S.C. 134 (g) and 49 U.S.C. 5303 (f)]. This transportation plan must cover at least a 20-year planning horizon, and "shall include both long-range and short-range strategies/actions that lead to the development of an integrated intermodal transportation system that facilitates the efficient movement of people and goods" [23 CFR 450.322]. Additionally, 23 CFR 450.322(f)(1) states that the metropolitan transportation plan shall include



the projected transportation demand of persons and goods in the metropolitan planning area over period of the transportation plan.

Observations: It was observed that the Des Moines Area MPO's travel demand model has not had long term consistency and reasonableness in the forecast population and employment data at the traffic analysis zone (TAZ) level. It has been noted that changes in future land use have impacted the projected future travel demand and associated network improvements. This was observed with the changes in land use around the Interstate 35/Grand Avenue interchange affected the ultimate project timing and design.

It was observed that the Des Moines Area MPO is having difficulties obtaining an experienced travel demand modeler and is considering other alternatives. The MPO has advertised for filling the position, but has been unable to find a qualified candidate. In the meantime, the DOT has assisted with model review, development and MPO staff training. The Des Moines Area MPO has also hired a consultant, HNTB, to review and make recommendations for improvements to their model.

It was observed that the travel demand model structure does not include a transit element. For the past 12 years or more, the MPO has been examining and discussing various transit alternatives for the region. When I-35 was being planned for a reconstruction a commuter rail alternative was studied, light rail has been talked about and currently several bus rapid transit studies are underway. In addition to the regions interest in transit the federal certification reviews have, when possible, suggested that transit be included into the regions travel models.

Finding: The Des Moines Area MPO accomplishes the requirements of 23 CFR 450.322(f)(1), thereby estimating future travel demand and analyzing the impacts of alternative transportation investment scenarios, utilizing a computerized travel demand forecasting model.

Recommendations: It is recommended that the Des Moines Area MPO retain the ability to perform modeling work.

It is recommended to further analyze the level of transit analysis required by the MPO, and then either build that functionality into the model or find a surrogate methodology to fill that need.

The following are technical recommendations that have been noted in the work with HNTB:



- a. Move the trip generation process out of the current spreadsheet and into TransCAD.
- b. Evaluate the need for the network turn penalties in the model.
- c. The number of external zones is adequate for this size of model. The DOT statewide model can help supplement the NCHRP External Analysis process.
- d. The number of TAZ's is adequate but could be expended if the need arose for more detailed transit analysis.
- e. Recommendation to consider purchasing an NHTS Add-on sample for the 2015 program.
- f. The feedback loop in the model process needs to be revised to work correctly.
- g. Upon model calibration ensure that FHWA model validation standards are met.
- h. Model documentation is good. A worthy addition is to add some explanation as to how to actually run the model.
- i. The model documentation or MTP document could also more explicitly cover the process to evaluate, select and prioritize projects for the MTP. An excellent example of best practice is the Corridor MPO.
- j. Provide a better definition in the model as to what projects are identified as "illustrative".
- k. Recommendation to move to LOS E/F for capacity.
- l. Incorporate Time of Day or Peak Hour analysis capabilities into the model.

Congestion Management and Operations

Regulatory Basis: A Congestion Management Process (CMP) is a requirement for transportation management areas (TMAs) and is a systematic approach for managing congestion through a process that “provides for safe and effective integrated management and operation of the multimodal transportation system, based on a cooperatively developed and implemented metropolitan-wide strategy, of new and existing transportation facilities eligible for funding under title 23 U.S.C., and title 49 U.S.C. Chapter 53 through the use of travel demand reduction and operational management strategies.” (23 CFR 450.320(a)).

The FHWA Final Rule and FTA Policy on Intelligent Transportation Systems (ITS) Architecture and Standards was issued on January 8, 2001 and codified under 23 CFR Part 940 ITS Architecture and Standards, implements Section 5206(e) of the Transportation Equity Act for the 21st Century (TEA-21). This Final Rule/Policy requires that all ITS projects funded by the Highway Trust Fund and the Mass Transit Account conform to the national ITS architecture,



whether they are stand-alone projects or combined with non-ITS projects, as well as to U.S. DOT-adopted ITS standards.

Observations: It was observed that a recommendation from the 2009 TMA Certification Review was that the MPO should follow the 8 step process in the development of the Congestion Management Process (CMP), which integrates the results of the CMP into the MTP and the overall transportation planning process. The MPO did not update their CMP since the last certification review.

In regard to ITS, it was observed that the travel demand modeler has historically maintained the ITS architecture, and a replacement modeler will need to get familiar with the ITS architecture requirements. One item of note is that a maintenance plan needs to be in place for the ITS architecture. It was noted during the review that FHWA can provide training and assistance with the Turbo ITS Architecture software.

A change since the last TMA certification review is that the Traffic Management Center (TMC) has been moved from the Des Moines area to Ames. The operation of this facility has been actively supported by the MPO. The TMC provides an opportunity for the region to benefit from greater availability of data, expanded use of intelligent transportation systems, and opportunities for regional cooperation and collaboration. During the review, it was noted that the MPO has requested data from the TMC on multiple occasions, and the Iowa DOT has not responded on these requests.

Finding: The Des Moines Area MPO does not comply with the requirements of 23 CFR 450.320.

Corrective Action: The Des Moines Area MPO must develop and approve a CMP that adheres to the eight step CMP approach that meets the requirements of 23 CFR 450.320.

- **Resolution:** The Des Moines Area MPO needs to adopt a CMP that adheres to the eight step CMP approach.
- **Action Plan:** A compliant CMP shall be approved by January 1, 2014.

Recommendation: It is recommended that the MPO establishes a maintenance plan for their ITS architecture.

Commendation: The Quick Clearance Guidelines is a best practice for Region VII metropolitan areas.



Conclusion

Certification Action

As per the language in 23 CFR 450.334(b)(1)(ii), it has been determined that the transportation planning process in the Des Moines metropolitan area substantially meets the requirements of this part and a TIP has been approved by the MPO and the Governor and is certified with conditions. The FHWA and FTA jointly certify the transportation planning process through July 13, 2017 subject to the following **corrective action**:

Corrective Action

1. **Congestion Management Process:** The Des Moines Area MPO does not have an approved Congestion Management Process (CMP) that meets the requirements of 23 CFR 450.320.
 - **Resolution:** The Des Moines Area MPO needs to adopt a CMP that adheres to the eight step CMP approach.
 - **Action Plan:** A compliant CMP shall be approved by January 1, 2014.



Appendix

Certification Review Agenda

Monday, April 29th, 2013

Time	Length	Topic
9:00 AM	2:30	Transportation Demand Model Review
1:00 PM	0:15	Kick-Off – Certification Review Overview
1:15 PM	0:30	Overview of Transportation Planning Issues
1:45 PM	0:15	Demographics
2:00 PM	0:30	MPO Organization
2:30 PM	0:30	Agreements and Coordination
3:00 PM	0:30	Metro Planning Area Boundaries
3:30 PM	0:15	Break
3:45 PM	0:30	Transportation Planning Process & Livability
4:15 PM	1:00	Unified Planning Work Program (UPWP)
5:15 PM	0:45	Break
6:00 PM	1:30	MPO Open House and Certification Review Presentation
7:30 PM		Adjourn

Tuesday, April 30, 2013

Time	Length	Topic
8:30 AM	1:00	Metropolitan Transportation Plan (MTP)
9:30 AM	0:30	Financial Planning
10:00 AM	0:15	Break
10:15 AM	1:00	Transportation Improvement Program (TIP) and Self Certification
11:15 AM	0:45	Congestion Management Process including Systems Operations and Management, ITS, and Safety and Security, Freight and Intermodal Connectors
12:00 PM	1:30	Lunch
1:30 PM		<i>Invite DART to afternoon sessions</i>
1:30 PM	1:30	Transit and Coordinated Human Services Transportation Plan
3:00 PM	0:45	Public Involvement
3:45 PM	0:15	Break



4:00 PM	1:00	Title VI, Environmental Justice and ADA
5:00 PM	0:30	Air Quality, Climate Change, Greenhouse Gas Reductions
5:30 PM		Adjourn

Wednesday, May 1st, 2013

Time	Length	Topic
9:00 AM	0:30	Review Status of Recommendations from Previous Certification Review
9:30 AM	1:00	Federal Team Meeting to Discuss Current Certification Review
10:30 AM	1:00	Closeout Meeting with MPO staff
11:30 AM		Adjourn TMA Certification Review

Certification Review Information

Description of the Metropolitan Area

The Des Moines Area MPO is the officially designated Metropolitan Planning Organization (MPO) for the Des Moines urbanized area. The metropolitan planning area (MPA) includes much of Polk County and parts of Dallas, Warren and Madison counties. The MPA also includes the cities of Altoona, Ankeny, Bondurant, Carlisle, Clive, Cumming, Des Moines, Grimes, Johnston, Mitchellville, Norwalk, Pleasant Hill, Polk City, Urbandale, Waukee, West Des Moines, and Windsor Heights. The central city of the metropolitan area is the City of Des Moines, the capital city of Iowa. The Des Moines metropolitan planning area is the largest population and employment center in Iowa.

The MPA currently contains a population of approximately 479,000, as reported in the 2010 Census. Since 1990, the population has increased by approximately 138,000, or 40 percent. This equates to an average annual growth rate of 1.7 percent. The City of Des Moines remains the largest community in the region, accounting for 42 percent of the MPA population and 43 percent of households. Growth within the City of Des Moines over the past 20 years has occurred at a rate of less than one-half percent per year, meaning just eight percent of the increase in total population is attributable to the population increase within Des Moines. West Des Moines and Ankeny grew by nearly 52,000 persons from 1990 to 2010 accounting for 40 percent of total population growth. Urbandale comprised another 10 percent of the population growth, increasing by nearly 16,000 persons. Approximately 61 percent of all housing units added over the prior two decades were located in four communities: West Des Moines, Ankeny, Urbandale, and Des Moines.



Organization of the MPO

The Des Moines Area MPO, established in the 1960s, serves as the formal transportation planning body for the greater Des Moines, Iowa, metropolitan area, carrying out the intent of 23 CFR 450. In 1983, the Governor of Iowa designated the Des Moines Area MPO as the official MPO for the Des Moines Urbanized Area, as defined by the U.S. Bureau of the Census (U.S. Census Bureau). In addition, the Des Moines Area MPO is designated a TMA, per 23 CFR 450.104, because it exceeds the population threshold of 200,000 persons. The Des Moines Area MPO continues to carry out a comprehensive, coordinated, and continuing multimodal transportation planning process for the greater Des Moines metropolitan area.

Three designated committees form the structure of the Des Moines Area MPO: the Transportation Technical Committee (TTC), the Executive Committee, and the Des Moines Area MPO serving as the Policy Committee. The Des Moines Area MPO member governments' and agencies' respective boards and councils appoint their respective representatives to the TTC and to the Des Moines Area MPO.

The Des Moines Area MPO TTC is comprised primarily of representatives of member governments' and participating agencies' technical staffs, including planners, engineers, and city administrators. The Des Moines Area MPO annually elects officers and at-large representatives to form an Executive Committee from among Des Moines Area MPO representatives. The Des Moines Area MPO is comprised primarily of county supervisors, elected officials that include mayors, city council members, and city managers.

The Des Moines Area MPO staff supports the TTC, the Executive Committee, and the Des Moines Area MPO. The TTC offers technical guidance and recommendations to the Executive Committee. The Executive Committee then offers recommendations to the Des Moines Area MPO, based on the TTC's recommendations, before the Des Moines Area MPO takes formal actions on transportation issues.

Additionally, the Des Moines Area MPO establishes and supports, as needed, other subcommittees, roundtables, working groups, and advisory committees on various transportation-related issues relevant to the Des Moines Area MPO's responsibilities.

Roadway Initiatives

The Des Moines Area has many major transportation issues, including: Southwest Connector corridor, the Northwest Transportation Corridor study, the Alice's Road/105th Street Interchange Justification Report, the Grand Avenue Interchange study, and the Hickman Road Interchange Operation Study. Interchanges that are in the project development process



include: the northeast mixmaster has a need for additional flyovers and improvements, the US 65 Interchange (east junction), 100th Street/Meredith, NW 26th bridge over Interstate 80/35(analyzing whether it is designed to accept a diamond interchange (it is noted that funding which was allocated to Polk County for this project has been returned so this project is not likely to proceed soon), the Cumming interchange, and a diverging diamond interchange (DDI) is being considered for 1st Street in Ankeny.

An Interstate designation is being considered for the Iowa Highway 5 (IA 5) /US Highway 65 (US 65) freeway corridor in the Des Moines metropolitan area. Issues of this conversion include: signage, ramp issues, design exemptions, farm access, and speed/weight restrictions for farm equipment. The MPO held a couple public meetings and “one on one” open house format meetings to discuss the issues with the public. In July of 2012, the Iowa DOT completed an Interstate Designation Summary Report in order to satisfy the FHWA requirements for identifying and documenting the need for potential improvements to meet design standards for Interstate roadway facilities. This summary report documented the methodologies and findings of the planning-level analyses including:

- Geometric analysis of existing roadway conditions;
- Safety analysis of roadway deficiencies;
- Right of way gate access points, alternative gate accesses, and slow moving vehicle provisions;
- Future traffic analysis of freeway conditions and interchanges in the freeway corridor; and
- Resulting concept-level cost estimates to rectify geometric deficiencies, replace signage, and provide alternative access roads.

This is a local initiative, as communities and businesses in the corridor see advantages to this highway being designated as Interstate. The Iowa DOT is not necessarily advocating for this Interstate designation, as there would be no benefit for the Iowa DOT. The MPO staff and Policy Board support this initiative. It is anticipated there will be a state/local (the MPO will participate in the local match) for cost sharing for the project costs, which is anticipated to be approximately \$6 million.

Major Transit Initiatives

MOU between MPO and DART regarding transit planning responsibility between the two agencies signed February 2013. The agreement was approved the year before, but was not signed, so it was signed in February.



The Des Moines Area Regional Transit (DART) system's bus storage/maintenance facility on Dart Way was built in the 1970s and needs some mechanical work/improvements made to the building. The downtown Central Station transit hub opened in November, and the passengers appreciate the indoor amenities, including restrooms and security. This hub replaces the outdated on-street Walnut Street Transit Mall which has been closed.

During the Certification Review the Federal Review team had a guided tour from the DART general manager of DART's Central Station. The Central Station is a state of the art transit transfer center. The station which opened 2012 was funded with \$10M of TIGER II funding in 2010 is a significant upgrade and replacement of the Walnut Street Transit Mall which was the scene of numerous bus-pedestrian accidents. The off-street Central Station transfer facility has bus passenger safety as the highest priority evidenced with one component; the pedestrian crosswalk to the bus loading platforms.

The MPO has always been very supportive of transit, and the move for DART becoming a voting member on the Policy Board since the previous 2009 Certification Review has been beneficial. Being a voting member, DART now doesn't feel like an "outsider." DART votes at every policy board meeting.

DART adopted its' Forward 2035 plan in September 2011, which documented projected services for the next 10 years. DART has implemented year one improvements and are working on year two improvements which include route adjustments/new service that will be rolled out in June, August and November 2013. . These improvements are estimated by DART to provide for 20% more service to the Des Moines area communities DART serves. DART has a tax levy for a dedicated funding source, and they can increase that levy by a DART board vote. This levy will be maximized within the next 10 years. In the past year there has been a slight fare increase for fares which now equal \$1.75 for a local Trip and \$2.00 for an express trip.

The MPO will be a lead for an upcoming feasibility study examining the possibility of intercity bus service between Ames and Iowa. The study will be conducted in FY 2014.

The Iowa DOT is expected to finalize the Chicago to Omaha passenger rail planning study soon. The MPO sent a letter of support to the Governor for this passenger rail service. The MPO plans to assist with half of the operational subsidies if the project is approved, and at this time they are waiting for the state legislature to approve funding. As a part of this project and before service could start, there would be a need for track upgrades and improvements, which would take several years to complete. The funding from the Federal Railroad Administration (FRA) only covers the cost from Chicago to Iowa City, and does not continue to Des Moines. The downtown Des Moines passenger rail station is located just one block east of



DART's Central Station. Therefore, there is a potential for this area to serve as an intermodal bus-passenger rail hub for downtown Des Moines.

The Tomorrow Plan, Livability and Sustainability

During the Certification Review, the Des Moines MPO staff gave a presentation of their "Tomorrow Plan." With Regional Planning funding from HUD, the Des Moines MPO and its consultants worked on a sustainability long range planning document for the Des Moines metropolitan area. The outcome of this three year planning effort is the "Tomorrow Plan" which is to be adopted summer or fall of 2013. This plan has a horizon year of 2050 and integrates transportation with social, economic, and environmental planning

The MPO has been the lead agency for the development of The Tomorrow Plan. A Steering Committee which has guided the plan's development is a subcommittee of the MPO. Currently, the MPO and its consultants are drafting a second draft of the plan. Once the MPO approves the plan, each individual community will have a general resolution to approve it locally as well. Following adopting other plan, the stakeholders working group and various focus groups will continue to be involved in the implementation of The Tomorrow Plan.

The MPO estimates that the development of the Tomorrow Plan thus far has included 150-200 meetings/presentations, which has engaged approximately 26,000 people in the Des Moines metropolitan area. The plan's four goals include: create resilient regional economy, improve the region's environmental health and access to the outdoors, further health and well-being of all residents, and increase regional cooperation and efficiency. The Tomorrow Plan discusses transportation choice, which may conflict with the infrastructure needs for capacity. There will need to be some work by the MTP to progress toward more funding for transportation alternatives and less toward infrastructure projects. In doing so, there may be a shift in funding to just the major projects and transportation choice projects.

As a result of this effort, there will be an initiative to develop a Regional Infrastructure Coordination Council (RICC) as a result of this plan, since there is currently no Council of Governments. Also, it is intended that a Watershed Management Authority will be established. Overall, the upcoming rollout of the final Tomorrow Plan represents three years of sustainable planning by the Des Moines MPO. The Tomorrow Plan represents a new era of sustainable, intermodal planning for the entire Des Moines metropolitan planning area including the often underrepresented low income and minority populations. The inclusion of The Tomorrow Plan into the MTP update shows commitment by the MPO to include sustainable planning as part of the metropolitan area's long range transportation planning.



Certification Review Public Hearing Notes

As a part of the transportation planning certification review, a public hearing is required and was held at 6:00 p.m. on April 29, 2013. The Federal Team gave a presentation on the transportation planning process and discussed the purpose and requirements of the certification review. The floor was then opened for any questions or discussion of the attendees of the meeting.

Jake Anderson and Bob Lacey, City of Van Meter, Iowa, expressed interest in Van Meter participating as an associate ex officio member of the Des Moines MPO. Van Meter is outside the MPO planning boundary but wishes to become part of the metropolitan planning process as a non-voting member of the MPO.

Mike Bolvis, citizen activist, presented official comments at the public meeting. He complimented the sustainability planning work that has been fostered by US DOT Secretary Ray LaHood. The MPO has been a great facilitator for the soon to be released Tomorrow Plan which includes sustainability planning encouraged by Secretary LaHood. Mr. Bolvis also stated that the MPO guides land use planning but needs to also enforce land use planning. He cited as an example the "Twin Cities Minnesota MPO" which uses zoning as a land use enforcement mechanism.

This public involvement effort saw a dramatic decrease in attendance from 2009 to 2013. As a result, a different strategy should be taken for the 2017 certification review. It is recommended to combine the next certification review public hearing with another event, such as a Citizen Transportation Congress, in order to attract more public input into the process.



Certification Review Letter from Interested Citizen

Michael Baldus
501 College Ave.
Des Moines, IA 50314

4/29/2013

To All Concerned Parties,

For many years, citizens of Des Moines came to DMAMPO meetings such as Citizen's Congress sessions, public input meetings and review sessions like this. I felt like we were in the wilderness. We were patiently tolerated, and then ignored.

The Tomorrow Plan changed all that. Never before had the citizenry been given such an opportunity for real input into the planning process. And you can see that when the approach to planning is truly a collaboration of citizens and government, the results are something much better than either group could create alone.

We have a very good blueprint, but the work has only just begun. As an ordinary citizen, I don't have the information to know what really is needed next. I only know that the staff of the MPO need all the support they can get. They made the difference. They have been a vital facilitator, and will be going forward.

I also would like to pass my deep appreciation to Secretary of Transportation Ray LaHood, for his visionary and courageous leadership. He is truly a leader in the greatest sense of the word.

Last, though it should be obvious from the results of the Tomorrow Plan, we need a tectonic shift in the distribution of funding for transportation. Mass transit became the red-headed stepchild decades ago, to the detriment of all - and I mean all - suburbanites and city dwellers alike.

I have never seen anything that attempted to audit the financial totals that Americans have collectively spent on the infrastructure that facilitates single passenger automobile use since the invention of the car - we can only imagine. It has been a stated fact that the Federal Interstate Highway system alone is the single largest construction in the history of mankind. More human labor and riches have been poured into that project than the Great Wall of China, the pyramids of Egypt, or the Panama Canal, and it has all been a mistake.

I issue that bold statement so I can ask you to ponder this question: With all that we have collectively invested in highways, parking lots and individual automobile expenses, what could we have built instead? I believe that we could have built, over these decades, the most fantastic public transportation system on earth. One that goes nearly everywhere, nearly all the time. One that has the variety and flexibility to serve everyone, for every transportation need. One that is much, much healthier and more environmentally sustainable than what we have today.

But of course hindsight is so much easier than foresight, and you may well not agree with my statement, but I hope you will at least consider the possibilities. Climate change is not something to be debated, it is something to be reckoned with. The next century will require every bit as much change from us as the last century. We'd best get started right now.

Sincerely,

Michael Baldus



Status of 2009 Certification Review Findings

The following are recommendations from the previous 2009 certification review. The review team has assessed each prior recommendation and has made a determination as to the status of the recommendation.

1. Transit Recommendations

The Review team noted that updating the planning agreement between DART and the MPO needs to be undertaken and the updated agreement needs to be approved between agencies. Both agencies need to explore if there are any improvements to the agreement or changes to the roles and responsibilities that are necessary. It is also recommended that transit goals and objectives are included in the MTP.

With the new project management staff now in place at DART, it is recommended that the BRT study recommence and that the MPO participate and provide assistance to this effort. We also recommend that the BRT study investigate the use of TRANSIMS modeling for the University corridor and those other corridors that have exceeded minimum thresholds of ridership to warrant modeling.

It is also recommended that the MPO consider DART as a voting member of the MPO. Although this requirement was not in place when the Des Moines Area MPO was established and is not a retroactive requirement, any MPO designated or re-designated after November 29, 1993 is required to have the public transportation agencies on their boards. Including these agencies on a board would normally indicate that they are a *voting* member. Although it is not required in this situation, it is good practice and in the spirit of SAFETEA-LU to include the transit agencies on the board and, therefore, is a recommendation.

Current status: This recommendation item is considered resolved.

2. Metropolitan Transportation Plan Recommendations

The Horizon Year 2035 MTP needs to be developed to meet the SAFETEA-LU planning regulations and address the eight planning factors. Additionally, although not a new requirement, a key aspect of the updated MTP will be fiscal constraint. FHWA and FTA will be closely reviewing projected costs and revenues to assure reasonable assumptions and projections. Project schedules and project selection will be constrained by reasonable revenue projections. Projects which cannot demonstrate



available revenue sources will need to be shown as illustrative, if it is decided to include them in the plan.

Current status: This recommendation item is considered resolved.

It is also recommended that the MPO introduce performance measures in the MTP that will assist the MPO in measuring success and progress toward desired goals. Performance measures are being recommended nationally for measuring progress, for determining expenditures on management and operations, and future Federal funding is being recommended as being performance based with cost/benefit outcomes. Performance measures use statistical evidence to determine progress toward specific defined organizational objectives, and relate to the goals and objectives. We encourage the MPO to expand their role as a data clearinghouse and provide leadership in tracking progress towards meeting the goals of the MTP.

Current status: The development of performance measures mandated by Map-21 will change this recommendation to a standard planning requirement.

3. TIP Recommendations

When TIP revisions take place at the board meetings, it is recommended that revisions to existing programmed projects within the TIP are clearly marked on agendas as such to distinguish them from new projects. This may reduce confusion by the public and the boards as to any TIP action that is being proposed.

Current status: This recommendation item is considered resolved.

4. Public Involvement and Communication Recommendations

The public participation plan, which was updated in 2008, should continue to be revised and developed 'in consultation' with interested parties. This means that the MPO should utilize a grass-roots effort of communication by seeking input from the public and interested parties on how to best engage various public groups and entities, rather than developing these techniques in-house and applying the techniques to the public and interested parties. As a part of the next MTP update, the plan should assess the effectiveness of efforts to engage those traditionally underserved (i.e. minority and low-income populations) through the local public involvement process. It is recommended that there be data collection to support the formal evaluation methods and responses to the findings for reaching the traditionally underserved in the transportation planning process.



The purposes of public involvement are to inform the public and to have the public concerns heard by the decision-makers. Comments from the public indicated a dislike of the open house forum for public meetings because of a ‘divide and conquer’ strategy where not all people in attendance hear comments from all those who attend the meetings. An opposing concern of a large meeting with an open microphone is that some people are not comfortable with large crowds. Ultimately, each type of meeting format has their benefits and drawbacks. The MPO should weigh these considerations with the alternative meeting formats, choose a meeting format that is appropriate for the audience and situation, and document the decision for various meeting formats. Where open house forums are used, it is strongly recommended that all concerns and conversations are documented so that the public feels they are heard.

There is also an issue that the MPO is seen as “the court of last resort” for public participation opportunities. With a healthy process, this should not be the case. As a result, it is recommended that the MPO foster public participation for local projects and work with the local jurisdictions to assure that the public is heard prior to projects reaching the MPO.

Current status: The Public Involvement and Communication Recommendations are considered resolved.

5. Title VI and Environmental Justice Recommendations

It is recommended that Environmental Justice (EJ) criteria be incorporated in the project selection process. The MPO should ensure that the planning process and the updated MTP has a demographic profile of the metropolitan planning area that identifies the locations of socio-economic groups, including low-income and minority populations as covered by the Executive Order (E.O.) 12898 and Title VI provisions. The planning process needs to identify the needs of the low-income and minority populations and assess if these needs are being met through the transportation planning process. There should be a data collection process to support the analysis effort, and the analysis process needs to seek to assess the benefits and impact distributions of the investments, including but not limited to impacts on different socio-economic groups for the investments identified in the MTP and TIP. The planning process should document the methods used to identify imbalances, and how the planning process responded to the analyses produced.

Current status: The collection of data on the participation of low-income and minority populations continues as a Recommendation item under the 2013 Certification Review.



6. Congestion Mitigation, Operations and Management Recommendations

The MPO should follow the 8 step process in the development of the Congestion Management Process (CMP) which integrates the results of the CMP into the MTP and the overall transportation planning process. The CMP is intended to provide strategies for inclusion in the MTP, and may also be used for intermediate and short-term planning purposes. It is recommended that operations goals and objectives be included in the MTP to bring Management and Operations strategies to the forefront.

The Federal team is concerned that the Iowa DOT is making decisions in regard to ITS activities without considering the impact on the MPO, in particular, to the Traffic Management Center (TMC) which has been actively supported by the MPO. The TMC provides an opportunity for the region to benefit from greater availability of data, expanded use of intelligent transportation systems, and opportunities for regional cooperation and collaboration. The TMC can improve the active management of the regional transportation system now and in the future. It is recommended that the MPO and the Iowa DOT work cooperatively to arrive at TMC decisions that benefit all parties and the entire region.

Identifying less capital intensive strategies should be one goal of the MTP update as well. This could include using the CMP to develop congestion management strategies including ITS solutions. The Des Moines Area MPO is updating the regional ITS architecture at this time and this would be an opportune time to tie this into the CMP and integrate it with the MTP.

The MPO has indicated that it is difficult to address congestion, since there are no serious congestion problems in Des Moines. However, it is recommended that the MPO use its definition of congestion and potential future congestion when developing the CMP and assure that the CMP is linked to the MTP.

Current status: The recommendation of the development of a Congestion Management Process continues as a corrective action under the 2013 Certification Review.



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