PERFORMANCE AUDIT
OF THE

BUREAU OF TRANSPORTATION PLANNING

MICHIGAN DEPARTMENT OF TRANSPORTATION

September 2003

59-150-01

Michigan

Office of the Auditor General

REPORT SUMMARY

Performance Audit

Bureau of Transportation Planning

Michigan Department of Transportation

Report Number:
59-150-01

Released:
September 2003

The Bureau of Transportation Planning (BTP) is responsible for developing and implementing the Michigan Department of Transportation's (MDOT's) intermodal planning process. BTP is organized into four divisions: Intermodal Policy, Statewide Transportation Planning, Project Planning, and Transportation Planning Services.

Audit Objective:
To assess the effectiveness of BTP's policies and practices for planning, developing, and implementing the three-year State Transportation Improvement Plan (STIP).

Audit Conclusion:
We concluded that BTP's policies and practices were generally effective. However, we noted reportable conditions related to consultant contracts and statutory compliance (Findings 1 and 2).

Agency Response:
BTP concurred with the recommendations related to both of these findings and informed us that it was taking corrective action.

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Audit Objective:
To assess the effectiveness of BTP's revenue estimation process for funding future transportation projects.

Audit Conclusion:
We concluded that BTP's revenue estimation process for funding future transportation projects was generally effective. Our report does not include any reportable conditions related to this audit objective.

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Audit Objective:
To assess the effectiveness of BTP's data collection process and related practices and their impact on the planning process and on MDOT's ability to maintain federal eligibility.

Audit Conclusion:
We concluded that BTP's data collection process and related practices and their impact on the planning process and on MDOT's ability to maintain federal eligibility need improvement. We noted reportable conditions related to project scoring and project data (Findings 3 and 4).

Agency Response:

BTP concurred with the recommendation related to Finding 3 and generally concurred with the recommendation related to Finding 4. BTP also informed us that it has been actively involved in efforts to improve the data collection efforts of the entire federal-aid system. During fiscal years 2000-01 and 2001-02, acting upon recommendations from the Act 51 Transportation Funding Study Committee, MDOT entered into an agreement with the County Road Association of Michigan, the Michigan Municipal League, and the Michigan Association of Regions to develop and test working guidelines for collecting, storing, reviewing, and analyzing data for the federal-aid eligible system.

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A copy of the full report can be obtained by calling 517.334.8050 or by visiting our Web site at: www.state.mi.us/audgen/

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THOMAS H. MCTAVISH, C.P.A.
AUDITOR GENERAL

September 11, 2003

Mr. Ted B. Wahby, Chairperson
State Transportation Commission
and
Ms. Gloria J. Jeff, Director
Michigan Department of Transportation
Murray Van Wagoner Transportation Building
Lansing, Michigan

Dear Mr. Wahby and Ms. Jeff:

This is our report on the performance audit of the Bureau of Transportation Planning, Michigan Department of Transportation.

This report contains our report summary; description of agency; audit objectives, scope, and methodology and agency responses and prior audit follow-up; comments, findings, recommendations, and agency preliminary responses; and a glossary of acronyms and terms.

Our comments, findings, and recommendations are organized by audit objective. The agency preliminary responses were taken from the agency's responses subsequent to our audit fieldwork. The *Michigan Compiled Laws* and administrative procedures require that the audited agency develop a formal response within 60 days after release of the audit report.

We appreciate the courtesy and cooperation extended to us during this audit.

Sincerely,

Thomas H. McTavish, C.P.A.
Auditor General

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MICHIGAN DEPARTMENT OF TRANSPORTATION

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Description of Agency

The Michigan Department of Transportation (MDOT) was organized under Sections 16.450 - 16.458 of the *Michigan Compiled Laws* (sections of the Executive Organization Act of 1965). MDOT is governed by the State Transportation Commission, which is made up of six members who are appointed by the Governor with the advice and consent of the Senate. The Commission is responsible for establishing policies. MDOT is managed by a director, who is appointed by the Governor. The director is responsible for administering MDOT and implementing the policies established by the Commission. MDOT's mission* is to provide the highest-quality transportation for economic benefit and improved quality of life.

Act 51, P. A. 1951, as amended, requires strategic planning to be performed as one of the major functions of MDOT. Also, MDOT is responsible for the State's compliance with the Federal Highway Act of 1970, as amended, which mandates that states maintain comprehensive transportation planning responsibility. U.S. Public Law 102-240, the Intermodal* Surface Transportation Efficiency Act of 1991 (ISTEA), and the Transportation Efficiency Act of 1998 (TEA21) require each state to develop transportation plans and programs for all areas of a state. Such plans and programs shall provide for the development of transportation facilities that will function as an intermodal state transportation system. ISTEA and TEA21 also require that a metropolitan planning organization* (MPO) be designated for each urban area with populations greater than 50,000. The MPO is responsible for developing transportation plans and programs for the urbanized area within its boundaries.

The Bureau of Transportation Planning (BTP) is one of six bureaus within MDOT. BTP is responsible for MDOT's intermodal planning process. BTP's role is to develop and implement an ongoing transportation planning process which results in transportation system recommendations that support the basis for programming projects consistent with social, economic, and environmental goals. BTP is organized into four divisions: Intermodal Policy, Statewide Transportation Planning, Project Planning, and Transportation Planning Services. BTP has as one of its primary responsibilities the biennial preparation of the State Transportation Improvement Plan* (STIP). The STIP is a staged, multiyear, Statewide, intermodal program of transportation projects. It is

** See glossary at end of report for definition.*

consistent with the Statewide transportation plan and planning processes and metropolitan plans, transportation improvement plans*, and processes. BTP relies primarily on information from other units within MDOT, MPOs, and local governments to complete the STIP. For example, MDOT regional offices prioritize projects that are outside of the MPOs' areas of authority and submit this information to BTP and MPOs prepare separate transportation improvement plan reports that list the projects to be included that are within their individual MPOs and submit a summary of this data to BTP for inclusion in the STIP.

BTP's funding is provided from vehicle gas, weight, and value taxes plus sales taxes on vehicles, parts, and accessories. This funding is distributed to transportation programs in accordance with Sections 247.651 - 247.675 of the *Michigan Compiled Laws* (Act 51, P.A. 1951, as amended). Funding is also provided by the U.S. Department of Transportation from federal fuel and excise taxes on certain commodities.

As of July 31, 2001, BTP had 212 employees. BTP expenditures totaled approximately $20 million for the fiscal year ended September 30, 2000.

** See glossary at end of report for definition.*

Audit Objectives, Scope, and Methodology and Agency Responses and Prior Audit Follow-Up

Audit Objectives

Our performance audit* of the Bureau of Transportation Planning (BTP), Michigan Department of Transportation (MDOT), had the following objectives:

1. To assess the effectiveness* of BTP's policies and practices for planning, developing, and implementing the three-year State Transportation Improvement Plan (STIP).

2. To assess the effectiveness of BTP's revenue estimation process for funding future transportation projects.

3. To assess the effectiveness of BTP's data collection process and related practices and its impact on the planning process and on MDOT's ability to maintain federal eligibility.

Audit Scope

Our audit scope was to examine the program and other records of the Bureau of Transportation Planning. Our audit was conducted in accordance with *Government Auditing Standards* issued by the Comptroller General of the United States and, accordingly, included such tests of the records and other such auditing procedures as we considered necessary in the circumstances.

Audit Methodology

Our audit included reviewing processes, programs, and documents developed as a result of the federal Intermodal Surface Transportation Efficiency Act of 1991 (ISTEA) regulations and Transportation Efficiency Act of 1998 (TEA21) regulations. Our audit procedures, performed from May through September 2001, included examination of BTP's records and activities primarily for the period October 1, 1998 through July 31, 2001.

To accomplish our first objective, we reviewed sections of ISTEA and TEA21 and proposed U.S. Department of Transportation federal planning regulations related to

** See glossary at end of report for definition.*

STIP development; Act 51, P.A. 1951; and MDOT policies to develop a checklist of project requirements for inclusion in the STIP. We traced projects that had proposed construction let dates* after September 30, 1997 to status reports to determine whether they were completed as indicated on the STIP. Also, we met with Federal Highway Administration officials regarding federal regulations and their relationship with BTP. In addition, we reviewed the allocation of the revenues to the regions used to develop project lists for inclusion in the STIP. We visited regional offices to determine their role in the STIP process. We developed a checklist of requirements for a project's inclusion in a transportation improvement plan, and we reviewed selected transportation improvement plans. We contacted selected metropolitan planning organizations to determine their role in the process. Also, we reviewed the requirements for the State long-range plan and reviewed the data used in the plan.

To accomplish our second objective, we analyzed the methods used to project federal revenue for projects in the STIP. In addition, we reviewed documents, assumptions, and calculations used to develop estimates of State revenue utilized to match federal funds. We reviewed the STIP to determine whether projected revenue levels were consistent between fiscal years 2001-02 through 2003-04 and whether the documents were financially constrained. We compared actual levels of State revenue with BTP projections for fiscal years 1998-99 through 1999-2000. We also compared actual levels of federal revenue with BTP projections for fiscal years 1999-2000 and 2000-01.

To accomplish our third objective, we identified the components of data used in the scoring process to select projects and determined whether reliance could be placed on the data for planning purposes. Also, we reviewed the process to maintain federal eligibility and verified the controls in place to ensure that the data is accurate and the monitoring equipment used to gather data is working properly. In addition, we obtained an understanding of the purpose of models within the planning structure and the data that is used within the models.

Agency Responses and Prior Audit Follow-Up

Our audit report contains 4 findings and 5 corresponding recommendations. The agency preliminary responses indicated that BTP concurred with all 5 recommendations and will initiate corrective action for them.

** See glossary at end of report for definition.*

The agency preliminary response that follows each recommendation in our report was taken from the agency's written comments and oral discussion subsequent to our audit fieldwork. Section 18.1462 of the *Michigan Compiled Laws* and Department of Management and Budget Administrative Guide procedure 1280.02 require MDOT to develop a formal response to our audit findings and recommendations within 60 days after release of the report.

BTP had complied with 10 of the 12 prior audit recommendations included in the scope of our current audit. We repeated 1 prior audit recommendation and the other prior audit recommendation was rewritten for inclusion in this audit report.

COMMENTS, FINDINGS, RECOMMENDATIONS, AND AGENCY PRELIMINARY RESPONSES

EFFECTIVENESS OF POLICIES AND PRACTICES FOR THE STATE TRANSPORTATION IMPROVEMENT PLAN

COMMENT

Audit Objective: To assess the effectiveness of the Bureau of Transportation Planning's (BTP's) policies and practices for planning, developing, and implementing the three-year State Transportation Improvement Plan (STIP).

Conclusion: We concluded that BTP's policies and practices were generally effective. However, we noted reportable conditions* related to consultant contracts and statutory compliance (Findings 1 and 2).

FINDING

1. Consultant Contracts

BTP did not adhere to established policies and procedures when contracting with consultants. In addition, BTP did not have sufficient policies and procedures to help ensure the effectiveness of its contracting process.

The Michigan Department of Transportation (MDOT) had established a service contracting handbook that provided standards for contracting for services throughout MDOT. In addition, BTP developed contract development guidelines for its use during the contracting process.

BTP entered into multiyear consultant contracts totaling over $11.2 million (32 contracts) and $14.4 million (32 contracts) for fiscal years 1998-99 and 1999-2000, respectively.

** See glossary at end of report for definition.*

Our review of 7 of the 64 consultant contract files disclosed:

a. BTP included "not-to-exceed" language in 2 of the 7 requests for proposals reviewed. BTP used this method of bidding for research-type projects in cases in which it was not sure what the end product would be. However, including the not-to-exceed language informs potential bidders of the maximum allowable contract amounts. This may result in the bidders developing their proposals to match the available dollars instead of developing the proposals to best address the issues identified in the request for proposal.

   Neither MDOT's service contracting handbook nor the BTP contract development guidelines provide guidance for the use of "not-to-exceed" clauses. Development of such guidance would assist staff in understanding if, when, and how this process should be utilized.

b. BTP did not date stamp bidder proposals and bids received. MDOT's service contracting handbook required that a specific submission date be established and adhered to for submitting proposals and bids. The handbook also required documentation of the receipt of proposals and bids. Failure by a bidder to submit a proposal and bid by the established deadline would result in elimination of the related proposal from further consideration. Without this information, BTP cannot document that proposals and bids were received by the established submission dates.

c. BTP did not retain the proposals and bid documents from all bidders. Instead, BTP retained only the proposal and bid from the bidder who was awarded the contract. The retention of all related bid documents helps ensure that MDOT has the information necessary to support its decisions in the selection process in the event of an appeal.

d. BTP did not require bidder selection team members to certify individual and consensus score sheets used in the determination of bidder selection. This certification provides assurance that the team members were in agreement with the final decision.

e. MDOT awarded one contract that did not include all of the planned project work. This resulted in BTP amending a $426,000 contract by more than $425,000. The amendment included one additional task, the preparation of an

operating plan, that was not in the original agreement. This was done without requesting or receiving new proposals and bids from other consultants. MDOT's service contracting handbook addresses the need to include all aspects of a project when developing initial requests for proposals. However, no guidance is provided to address what to do when conditions change or the original proposal did not include all relevant components of the project. The current practice of adding to existing contracts may limit MDOT from receiving the potential benefits obtained from rebidding.

f. BTP did not estimate the number of project hours prior to soliciting bidders for proposals and bids. MDOT's service contracting handbook requires project managers to estimate both the cost and the number of work hours prior to soliciting bidders. As a result, BTP did not have an estimate of the number of project hours needed for use as a guide when evaluating bidder proposals and bids. We were informed that the evaluation committee makes its own estimates when evaluating the proposals.

g. Contract files did not include conflict-of-interest and disclosure statements for all members of the bidder selection team. Because bidder selection team members' actions may result in the issuance of a State contract, it is a good practice to obtain conflict-of-interest and disclosure statements. The statements certify that neither they nor any member of their immediate family have any personal, financial, business, or other conflict of interest with any bidders submitting a proposal and bid. Revisions to MDOT's service contracting handbook and the BTP contract development guidelines to address the issues identified and implementation of these noted revisions would help ensure the effectiveness of the BTP contracting process. Revisions would also help ensure that the process follows generally accepted procurement practices.

RECOMMENDATIONS

We recommend that BTP adhere to established policies and procedures when contracting with consultants.

We also recommend that MDOT develop sufficient policies and procedures to help ensure the effectiveness of its contracting process.

AGENCY PRELIMINARY RESPONSE

BTP concurred with the recommendations and indicated that it:

a. Discussed the comments regarding the use of "not-to-exceed" clauses in request-for-proposal documents with the MDOT Contracts Network on June 11, 2003 and requested that the Network consider clarifying the service contracting handbook in this regard.

b. Established a procedure to document proposal receipt dates on May 29, 2003.

c. Established a procedure to retain proposals and bid documents on May 29, 2003.

d. Established a procedure to certify individual and consensus score sheets on May 29, 2003.

e. Discussed the procedures regarding contract amendments and the procedures for addressing changed conditions and changes in scope with the MDOT Contracts Network on June 11, 2003 and requested that the Network consider clarifying the service contracting handbook in this regard.

f. Established a procedure for estimating the number of project hours necessary to complete a project prior to soliciting proposals on May 29, 2003.

g. Established a procedure to confirm that State of Michigan staff who serve on consultant selection teams have signed the State of Michigan conflict-of-interest form. BTP also established a procedure to obtain conflict-of-interest and disclosure statements from non-State of Michigan staff who serve on consultant selection teams. Both procedures were established by May 29, 2003.

FINDING

2. Statutory Compliance

MDOT did not comply with the statutory due dates for the STIP.

Section 247.660E(8) and Section 247.660E(9) of the *Michigan Compiled Laws* require MDOT to prepare and file the STIP for public inspection by March 1 of the year preceding the STIP beginning period and to file the STIP with the State Transportation Commission by April 1 of that year. We noted that MDOT did not file the STIP for the three-year period 2002 through 2004 for public inspection until September 8, 2001. In addition, the STIP was not filed with the State Transportation Commission until October 15, 2002.

Although MDOT did not meet the State filing requirements, it did meet the Federal Highway Administration requirements. The Administration required the STIP's biennial submission to be in October 2002, based on when the 2000 STIP was submitted.

Because of the later reporting requirement, the federal time frames appear more useful to the planning process. The later reporting requirement provides the applicable planning entities with better knowledge of what projects were completed during the prior construction period when preparing the new information.

In our prior audit, we recommended that MDOT either comply with the statutory due dates or request amendatory legislation. MDOT agreed with the recommendation and indicated that it would request amendatory legislation. However, MDOT had not requested the amendatory legislation.

RECOMMENDATION

WE AGAIN RECOMMEND THAT MDOT EITHER COMPLY WITH THE STATUTORY DUE DATES FOR THE STIP OR REQUEST THE LEGISLATURE TO AMEND THESE SECTIONS TO MAKE THEM CONSISTENT WITH CURRENT PLANNING PRACTICES AND FEDERAL REQUIREMENTS.

AGENCY PRELIMINARY RESPONSE

BTP concurred with the recommendation and informed us that MDOT will request the Legislature to amend Sections 247.660E(8) and 247.660E(9) of the *Michigan Compiled Laws* to make them consistent with current planning practices and

federal requirements. BTP will submit this request for amendment to the Office of Governmental Affairs by July 2003, requesting this item to be included on the legislative agenda when other substantive changes are also proposed to the legislation.

EFFECTIVENESS OF REVENUE ESTIMATION PROCESS

Audit Objective: To assess the effectiveness of BTP's revenue estimation process for funding future transportation projects.

Conclusion: We concluded that BTP's revenue estimation process for funding future transportation projects was generally effective. Our report does not include any reportable conditions related to this audit objective.

EFFECTIVENESS OF DATA COLLECTION PROCESS

Audit Objective: To assess the effectiveness of BTP's data collection process and related practices and their impact on the planning process and on MDOT's ability to maintain federal eligibility.

Conclusion: We concluded that BTP's data collection process and related practices and their impact on the planning process and on MDOT's ability to maintain federal eligibility need improvement. We noted reportable conditions related to project scoring and project data (Findings 3 and 4).

FINDING

3. Project Scoring

MDOT did not have effective controls over reconstruction and rehabilitation (R&R) projects that included documenting the factors used in the scoring process for prioritizing future projects.

MDOT developed an automated process that assigns a score to the R&R projects to aid in evaluating which projects will be included in the STIP. The scoring process helps streamline the project evaluations and also helps to make them more uniform. The data used to implement the scoring process is derived from

project information entered into databases primarily by regional staff. The scoring model then processes this information to calculate a score.

The scoring process incorporated 8 individual factors that are used to calculate a score for each potential project, with a maximum score of 800 points. We were informed that, generally, the higher the score the more likely that a project will be included in the STIP. BTP has provided instructions on how the necessary information should be prepared and included in the databases to ensure that the scoring process for R&R projects is timely and accurately reflects the need for activities to improve the roads throughout the State.

Our review of projects included in the STIP for the three-year period 2002 through 2004 process noted:

a. The MDOT Architect Project (MAP) System did not contain sufficient edits to ensure that all necessary information was provided and was in the proper format. The information for several of the projects reviewed was either missing or inaccurate for all 8 of the factors used to calculate the overall project scores. As a result, those projects with incomplete or inaccurate data fields scored lower than comparable projects with complete and accurate data fields. This requires additional effort on the part of the regional staff and BTP to justify the inclusion of those projects that are improperly scored.

   We examined one region's projects considered for inclusion in the STIP and noted that, even though the regional office ultimately was able to justify the inclusion of 33 projects within the STIP, initially 14 (42%) of these projects were excluded through the scoring process. Data was either missing from or incomplete in 40% of the data fields for these 14 projects. As a result, additional analysis was required to support including the projects on the preliminary list.

b. The regional offices did not consistently apply BTP's guidance to develop priority scores for R&R projects. The priority scores comprise 25% of the overall scores for R&R projects. We noted:

   (1) BTP staff stated that they had verbally informed regional offices to prioritize projects by year. However, BTP did not follow up this verbal communication in writing and, thus, could not document that all regional

offices had been informed. As a result, all regions did not adhere to this practice. We noted that one region prioritized projects over a five-year period.

(2) The regions did not use BTP's prescribed process to prioritize projects. The regions were to rank the projects individually from 1 through 10, with an equal number of projects being assigned to each of the 10 priority categories. For example, if there were 20 projects, there should be 2 prioritized in category 1, 2 prioritized in category 2, etc. However, we noted that projects were assigned priorities of 0. We also noted that some regions' rankings had gaps in the priority numbers assigned to the projects.

BTP staff could not readily determine what impact the inconsistent application of priority factors would have on the overall project scores. However, they did not believe that the use of the data would affect the overall outcome of which projects were selected because of the additional manual follow-up that would be done by BTP staff. Regardless of the final outcome, MDOT developed the MAP System to streamline the identification of projects included in the STIP. Allowing the use of inaccurate or inconsistent data in the MAP System diminishes its effectiveness.

c. Priority scores were not calculated in multiples of 10. The MAP System's project narrative stated that project priority would be scored in multiples of 10. We noted one score of 213, which exceeded the maximum point allocation of 200 for region priorities.

d. MDOT included error routines in the MAP System to help ensure that all relevant data was entered as intended and that necessary fields contained data; however, MDOT staff informed us that most of the error routines were not functioning because they were not updated when system changes were made. The lack of functioning error routines limited MDOT's ability to ensure that the program was operating as intended and that scores were appropriate.

e. MDOT did not document how the multipliers used to calculate the user savings and the maintenance savings were determined:

(1) User savings is the product of vehicle miles traveled times a multiplier that measures the savings that road travelers will receive as a result of a road construction project.

(2) Maintenance savings is the product of road surface condition times a predetermined multiplier that measures the savings to MDOT from reduced maintenance as a result of a road construction project.

Without documentation of the methodology for calculating the multipliers, MDOT is unable to periodically evaluate the multipliers to determine whether they should be adjusted.

RECOMMENDATION

We recommend that MDOT implement effective controls over R&R projects that include documenting the factors used in the scoring process for prioritizing future projects.

AGENCY PRELIMINARY RESPONSE

BTP concurred with the recommendation and indicated that it is working with a contract programmer to make the necessary changes to the scoring process and the MAPScore prioritization process. BTP indicated that these changes were completed in June 2003. In addition, BTP will include functioning error routines in the MAPScore prioritization model to ensure that the programs operate as intended by the end of September 2003.

BTP also informed us that:

1. It will take appropriate action to ensure that necessary information is provided on R&R projects to be scored by the prioritization process.

2. It has revised the prioritization model and will no longer use the region priority score.

3. It will document how the multiplier used to calculate maintenance savings was determined. This will be completed annually in June.

BTP further stated that the multiplier used to calculate user savings was completed and is available; however, it was not provided to the auditors. BTP will continue to document this process annually in June.

FINDING

4. Project Data

MDOT had not developed an effective process to obtain and maintain information during the STIP process that could assist in planning future projects.

The creation of the STIP relies, in part, on a departmentwide database that is updated by other divisions within MDOT. This information is used for various purposes that include determining which projects should be included in the STIP, monitoring the contract letting process, identifying which projects were abandoned, and monitoring the remaining service life (RSL) of roadways. Analysis of components of this information can be used to identify areas that can assist in planning for future projects. Therefore, the overall accuracy and completeness of this information is essential. Our review of 50 projects that had a scheduled award date after September 30, 1997 noted:

a. Components of the database contained incomplete information:

(1) The data fields for two of the categories used by the database to identify which projects need to be included in the STIP either did not always reflect the correct project status or were blank. This information is used to determine if the projects should be in the STIP and which STIP they should be in. These discrepancies resulted in part from the "STIP required" field defaulting to "yes" and BTP not routinely reviewing this field's contents for accuracy. This could result in projects incorrectly being either included in or excluded from the STIP. Projects incorrectly included could impact other potential projects because of a funding cap.

(2) BTP did not always enter the actual contract award dates into the database. Without this information, we could not compare planned award

information to actual award information. This information could assist MDOT in refining the overall planning process by identifying the causes of significant differences between the proposed and actual award dates that occur so that the causes can be addressed for future projects.

(3) The "fix life* year" field, which is one of the components of the RSL, did not always contain information regarding the number of years that the R&R projects would add to the life of a roadway. Our review noted that one of the four State projects that should specify a fix life did not. We also noted that local projects did not necessarily include the fix life information for their projects to update the RSL. This would also appear to limit MDOT's ability to determine the overall RSL for local roadways that connect with State roadways. The RSL is a primary factor in MDOT's determination of good quality roads. This would limit MDOT's ability to determine that it implemented a comprehensive overall Statewide plan to ensure that 95% of freeways and 85% of nonfreeways are classified as good quality roads throughout the State by 2007.

These discrepancies resulted, in part, from not requiring those entities that provide data to include relevant information when updating the databases and not including functioning error routines that could detect when this information is either missing or incorrect.

b. MDOT did not require the inclusion in the database of the reasons why projects were not completed. The databases did not contain information on why 7 (14%) of the 50 projects were not completed. The reasons why these projects were not completed could provide beneficial information when planning future projects.

c. Project let information was inconsistent. We noted the following inconsistencies regarding the projects reviewed:

(1) Sixteen projects showed that no let date was needed; however, all 16 contained let dates.

** See glossary at end of report for definition.*

(2) Four projects had blanks in the "let indicator" field. They should have been either "yes" or "no."

(3) Four projects with actual start dates and a "yes" in the "let indicator" field did not have an actual let date.

One of the major reasons MDOT maintains databases is to improve the analysis of information for making decisions. The lack of this information limits MDOT's ability to effectively utilize the database.

RECOMMENDATION

We recommend that MDOT develop an effective process to obtain and maintain information during the STIP process that can assist in planning future projects.

AGENCY PRELIMINARY RESPONSE

BTP generally concurred with the recommendation and informed us that:

a. BTP replaced the "STIP required" field with the "STIP proposed" field in January 2003. Also, BTP has adopted a process to routinely review the "STIP proposed" and "STIP year" fields' contents for accuracy. This process was fully implemented in July 2003.

   It is not BTP's responsibility to enter the "actual contract award dates" in the MAP database. However, by August 2003, BTP will contact and discuss the population of this field with the Bureau of Finance and Administration in an attempt to ensure that this data is supplied.

   BTP discussed and encouraged MDOT staff to populate the "fix life year" field for trunkline R&R projects at the July 2003 Call for Projects meetings as well as at the 2003 Systems Managers conference this summer. MDOT does not require local projects to specify a "fix life." This does not limit MDOT's ability to determine if a comprehensive overall Statewide plan was implemented since MDOT is not responsible for the local roadways and the local roadways are not considered part of the pavement condition goal.

b. Neither BTP nor federal regulations require information as to why projects were not completed to be maintained on the MAP database. This information

is documented on a 2604 change request form and submitted at the time the request to change the status code of a project is made. It is available for review by BTP staff thereafter.

c. BTP will send out a memorandum to the Bureau of Finance and Administration, regions, and other responsible parties to encourage and remind them to provide complete and accurate project let information for the database population. This correspondence will take place prior to the July 2004 Integrated Call for Projects meetings with the regions.

BTP also informed us that it has been actively involved in efforts to improve the data collection efforts of the entire federal-aid system. During fiscal years 2000-01 and 2001-02, acting upon recommendations from the Act 51 Transportation Funding Study Committee, MDOT entered into an agreement with the County Road Association of Michigan, the Michigan Municipal League, and the Michigan Association of Regions to develop and test working guidelines for collecting, storing, reviewing, and analyzing data for the federal-aid eligible system.

BTP further stated that Act 499, P.A. 2002, established a formal asset management process for Michigan roads and bridges. The law established the Transportation Asset Management Council (TAMC). The TAMC, which reports directly to the State Transportation Commission, is composed of a county commissioner, a township official, and representatives from county road commissions, cities, regional and metropolitan planning organizations, and MDOT. A part of the TAMC roles and responsibilities is to establish procedures for collecting data and filing reports.

Glossary of Acronyms and Terms

BTP	Bureau of Transportation Planning.
effectiveness	Program success in achieving mission and goals.
fix life	The period of time that a fix will extend the life of a road.
intermodal	Transportation by more than one means of conveyance.
ISTEA	Intermodal Surface Transportation Efficiency Act of 1991.
let date	The date that a contract is awarded.
MAP	MDOT Architect Project.
MDOT	Michigan Department of Transportation.
metropolitan planning organization (MPO)	The forum for cooperative transportation decision making for a metropolitan planning area.
mission	The agency's main purpose or the reason that the agency was established.
performance audit	An economy and efficiency audit or a program audit that is designed to provide an independent assessment of the performance of a governmental entity, program, activity, or function to improve public accountability and to facilitate decision making by parties responsible for overseeing or initiating corrective action.
R&R	reconstruction and rehabilitation.
reportable condition	A matter that, in the auditor's judgment, represents either an opportunity for improvement or a significant deficiency in

	management's ability to operate a program in an effective and efficient manner.
RSL	remaining service life.
State Transportation Improvement Plan (STIP)	A staged, multiyear, Statewide, intermodal program of transportation projects that is consistent with the Statewide transportation plan and planning processes and metropolitan plans, transportation improvement plans, and processes.
TAMC	Transportation Asset Management Council.
TEA21	Transportation Efficiency Act of 1998.
transportation improvement plan	A staged, multiyear, intermodal program of transportation projects that is consistent with a metropolitan transportation plan.