# REVIEW OF PERFORMANCE MEASURES FOR HIGHWAY AND ROAD MAINTENANCE

## **AUGUST 2007**



CITY AUDITOR'S OFFICE CITY OF GAINESVILLE, FLORIDA

## Inter-Office Communication

August 30, 2007

TO:

Audit, Finance and Legislative Committee

Mayor Pegeen Hanrahan, Chair

Mayor-Commissioner Pro Tem Rick Bryant, Member

FROM:

Brent Godshalk, City Auditor

**SUBJECT:** 

Review of Performance Measures for Highway and Road Maintenance

## Recommendation

The Audit, Finance and Legislative Committee recommend that the City Commission:

- 1) Accept the City Auditor's report and the response from the City Manager, and
- 2) Instruct the City Auditor to conduct a follow-up review on recommendations made and report the results to the Audit, Finance and Legislative Committee.

## **Explanation**

In accordance with our Annual Audit Plan, we have completed a Review of Performance Measures for Highway and Road Maintenance. Our report, which includes a response from the City Manager, is attached for your review.

We request that the Committee recommend the City Commission accept our report and the City Manager's response. Also, in accordance with City Commission Resolution 970187, Section 10, Responsibilities for Follow-up on Audits, we request that the Committee recommend the City Commission instruct the City Auditor to conduct a follow-up review on recommendations made and report the results to the Audit, Finance and Legislative Committee.

# \_\_City of \_\_\_ Gainesville

Inter-Office Communication

April 6, 2007

TO:

Russ Blackburn, City Manager

FROM:

Brent Godshalk, City Auditor

**SUBJECT:** 

Review of Performance Measures for Highway and Road Maintenance

In accordance with our Annual Audit Plan, we have completed a Review of Performance Measures for Highway and Road Maintenance. During our review, we conducted interviews with key personnel, reviewed management controls and tested the reasonableness of data reported to the ICMA Center for Performance Measurement for publication in their Annual Comparative Performance Measurement Report. The attached draft report indicates areas where further efforts are needed to strengthen management controls.

In accordance with Commission Resolution 970187, Section 9, please submit your written response to the recommendations presented in the attached report within 30 days and indicate an actual or expected date of implementation. Our final report, which will include your written response, will then be submitted to the City Commission's Audit, Finance and Legislative Committee for review and approval. The next meeting is scheduled for May 15, 2007.

Our recommendations for improving procedures and controls have been reviewed with Public Works Director Teresa Scott, Operations Division Manager Tom Frisbie and Strategic Planning Manager Karen Snyder. We would like to thank them and staff involved in our review for the courteous and cooperative treatment afforded us.

Please let me know if you would like to meet to discuss further the details of this report or if you have any comments or questions that will facilitate your response.

cc: Teresa Scott, Public Works Director Tom Frisbie, Operations Division Manager Karen Snyder, Strategic Planning Manager

### **OBJECTIVES, SCOPE AND METHODOLOGY**

In accordance with our Annual Audit Plan, the City Auditor's Office completed a Review of Performance Measures for Highway and Road Maintenance. The primary focus of this review was to provide the City Commission with an independent assessment of the adequacy of management controls in effect over the performance measurement reporting system. Management controls include the processes for planning, organizing, directing and controlling program operations, including systems for measuring, reporting and monitoring program performance. Management is responsible for establishing and maintaining effective controls that, in general, include the plan of organization, methods and procedures adopted to ensure that goals are met. Specific audit objectives included evaluating the reliability and validity of performance measurement data submitted for publication in the Annual ICMA Comparative Performance Measurement Report and assessing the comparability of these measures to peer cities.

Our review was conducted in accordance with Government Auditing Standards issued by the Comptroller General of the United States and accordingly included such tests of records and other auditing procedures as we considered necessary under the circumstances. Our procedures included reviewing performance related literature, interviewing staff, reviewing management controls and verifying selected samples of key performance measures. The scope of our review was generally for performance measurement data compiled and reported to the ICMA Center for Performance Measurement by the Public Works Department for Fiscal Years 2003 through 2005.

Based on the results of our review, we prepared specific issues and recommendations for improvement that were discussed with management. These recommendations, as well as management's written response, can be found in the following sections of this report.

#### **BACKGROUND INFORMATION**

An effective performance measurement program provides reliable and accurate information that can be used to assess the efficiency and effectiveness of City programs, facilitate decision making by management and the City Commission and enhance accountability to the public. Performance measurement also provides benchmarks that can be used to compare the relative success of City programs to established goals, historical trends and service levels provided in similar communities.

The Government Finance Officers Association (GFOA) advocates using performance measurement and believes it is most effective when fully integrated into the budgetary process and reflecting specific strategies, goals and objectives as determined by elected officials. The GFOA recommends that program and service performance measures should be:

- Based on program goals and objectives that link to a statement of program mission or purpose;
- Able to measure program outcomes;
- Able to provide for resource allocation comparisons over time;
- Able to measure efficiency and effectiveness for continuous improvement;
- Verifiable, understandable and timely;
- Consistent throughout the strategic plan, budget, accounting and reporting systems and to the extent practical, be consistent over time;
- Reported internally and externally;
- Monitored and used in managerial decision making processes;
- Limited to a number and degree of complexity that can provide an efficient and meaningful way to assess key programs; and
- Designed to motivate staff at all levels to contribute toward organizational improvement.

The Governmental Accounting Standards Boards (GASB) advocates that performance measures are needed beyond traditional budgets and financial statements to improve government's accountability to the public and to enhance economic, social and political decision making. GASB promotes using performance measures for:

- Setting goals and objectives;
- Planning program activities to accomplish these goals and objectives;
- Allocating resources to programs;
- Monitoring and evaluating results to determine if progress is being made toward achieving goals and objectives; and
- Modifying program plans to enhance performance.

In summary, performance measures are most effective if they are simple, commonly understood, realistic and meaningful. The success of a performance measurement system requires that departments take ownership of the measures and ensure their accuracy for decision making purposes.

## City Implementation of Performance Measurement Programs - Three-Tier Approach

In recent years, the City of Gainesville has undertaken initiatives to develop a performance measurement system designed to improve City services and organizational efficiencies and provide reasonable comparisons between Gainesville and peer cities. Currently, each department is generally required to participate in a performance measurement program within three options. The options include benchmarking with other communities at a national level, within the State of Florida or utilizing internally created performance measures and targets.

- 1. National Level In Fiscal Year 2003, the City began participating in the ICMA Center for Performance Measurement (CPM) program. The CPM was established in 1994 to help local governments improve the effectiveness and efficiency of public services through the collection, analysis and application of performance information. The CPM currently has over 150 participating communities throughout the US and Canada and provides an opportunity for interagency benchmarking and internal performance improvement comparisons on a national basis. The City reports data for 13 core service areas, such as Highway and Road Maintenance, Code Enforcement and Housing.
- 2. State Level In Fiscal Year 2004, the City explored other performance measurement programs and became a founding member of the Florida Benchmarking Consortium (FBC). The FBC is a collaboration of Florida local governments seeking to improve upon or implement performance measurement programs. Currently, the FBC consists of nearly 30 cities and counties around the State of Florida. Strategic Planning Division staff are members of the steering committee in this emerging group.
- 3. Internal Indicators During the budget process, each department reports internal indicators that provide information on departmental activities and accomplishments, including performance targets and actual results. The development of the indicators may be required by law or accreditation, programs of particular interest, grant funded reporting requirements, associations or other professional organizations' programs or internal benchmarking opportunities.

The success of any performance measurement system depends on the data supporting the system to be accurate, reliable and consistent. In an effort to improve the City's performance measurement system, the City Auditor's Office has initiated a series of reviews to evaluate departmental performance measurement. These reviews provide recommendations to management and the City Commission for improving the reliability and validity of performance data collected and reported. Our first review of this type was issued in November 2006 and focused on key ICMA performance measures for Parks and Recreation. The recommendations in this report focus on key performance measures for Highway and Road Maintenance compiled by the Public Works Department and reported to the ICMA Center for Performance Measurement. In addition, observations related to the overall General Government performance measurement program are included at the end of this report.

#### ISSUE #1

## Improvements in Performance Measurement Data Collection, Documentation and Reporting

#### Discussion

The ICMA Center for Performance Measurement (CPM) collects annual operating data from over 150 participating local governments. Participants answer a series of questions onto standardized survey templates. Templates utilized by the CPM for Highway and Road Maintenance include the following categories:

- General statistics of the population and geographic area served;
- Road rehabilitation expenditures per paved and unpaved lane miles;
- Road rehabilitation expenditures per capita;
- Paved lane miles assessed in satisfactory or better condition;
- Number, costs and timeliness of pothole repairs;
- Street sweeping expenditures per linear mile swept;
- Street sweeping expenditures per capita;
- Number of traffic signals repaired or replaced;
- Expenditures for traffic signals repaired or replaced;
- Average response time to complete traffic signal repairs or replacements;
- Citizen ratings of road conditions; and
- Citizen ratings of street sweeping.

During our review, we conducted a trend analysis of Highway and Road Maintenance data transmitted to the CPM for Fiscal Years 2003, 2004 and 2005. We then reviewed the data submitted, on a test basis, for accuracy and consistency. The results of our review indicate that Public Works staff has consistently focused considerable efforts on collecting and reporting complete and accurate performance measurement data to the CPM. Audit testing indicated that reported data was generally accurate, complete and adequately supported. However, we noted several items where we believe improvements in internal controls over Highway and Road Maintenance performance measures are needed.

#### Data Accuracy

Public Works uses an automated work order management system (WMS) to facilitate tracking job requests and subsequent work orders. WMS primarily consolidates labor and machine hours and determines productivity costs per project. When the City began utilizing the ICMA CPM system in 2003, the Public Works Department was already collecting data through WMS and adapted this existing system for reporting the information requested by ICMA. Although we believe the system adequately tracks data, some adjustments and monitoring of the system are needed.

For instance, total rehabilitation expenditures for paved lane miles during Fiscal Year 2005 were reported at \$729,189. However, our testing of the WMS system identified an unexplained \$162,892 overstatement of expenditures. Additionally, we noted that employee labor rates used in computing expenditures were not current and that the WMS system applied an unexplained annual overhead amount of \$3,000 per employee, increasing each employee's hourly billing rate by approximately \$1.60. During our discussions, Public Works initiated corrections to the system.

## Supporting Documentation

Supporting documentation for reported road maintenance data was not always available. The actual WMS reports used for ICMA reporting could not always be located and, due to system limitations, could not be easily reproduced.

## Data Availability

The CPM publishes annual Comparative Performance Measurement Reports that summarize participant responses and provide graphical comparisons to other participating local government organizations. Although the City of Gainesville was reflected in most of the relevant Highway and Road Maintenance performance measures reported in the 2005 CPM report, we noted several responses to the CPM that categorized information as "not available".

#### Formalized Procedures

Currently, no written guidelines exist that address the need for accurate and consistent collection and reporting of performance measurement data. Guidelines provide requirements to maintain adequate documentation in order to allow an independent recalculation of reported performance measures and ensure that evidence of supervisory review exists.

#### Conclusion

Although Public Works has a functional work order system for calculating data, some improvements are needed in the process of maintaining, collecting and reporting Highway and Road Maintenance performance measurement data to ensure accurate responses, identify areas of improvement and facilitate comparison of the City of Gainesville against similar organizations. Written procedures provide data input and reporting guidance, reduce the risk of errors and improve the overall administration of the performance measures program.

#### Recommendation

We recommend management take the following steps to improve internal controls over the performance measurement program and reporting systems related to Highway and Road Maintenance:

- Develop written procedures for evaluating key departmental performance measures and for maintaining, collecting, analyzing and reporting performance measurement data; including requirements for supervisory review and supporting documentation.
- Ensure that staff responsible for maintaining, collecting and reporting performance measurement information are familiarized with written guidelines and procedures; and
- Make noted adjustments to underlying assumptions and data within the WMS to improve its accuracy in cost reporting and ensure future adjustments are timely and documented.

### Management's Response

- The department has evaluated key departmental performance measures to ensure their usefulness in decision making, setting strategic priorities and assessing program results and identifying areas needing improvement. The department director will ensure that future year's evaluative efforts will be documented in writing.
- The department has established methods for maintaining, collecting, and analyzing and reporting performance measurement data. The department has not established this in writing but will do so over the next fiscal year. Once the document is prepared it will be distributed to all staff and managers responsible for performance measurement.
- The department has corrected the noted adjustments in the WMS and will document future adjustments in a timely manner.

## Development and Implementation of Citizen Satisfaction Survey

#### Discussion

A key element in improving government services is obtaining an understanding of customer needs, service problems and suggestions for service improvement. Citizen satisfaction surveys can serve as a useful tool in gauging citizen expectations and satisfaction with government services and increasing citizen participation in the local government process.

We noted during our review that formal citizen surveys have not been used to measure citizen satisfaction with various Highway and Road Maintenance services. Although the CPM's Annual Comparative Performance Measurement Reports include measurements of citizen satisfaction for road conditions and street sweeping, the City of Gainesville has not reported any data in these categories.

#### Conclusion

The establishment and periodic distribution of a citizen satisfaction survey would assist management in obtaining citizen input and provide valuable information necessary for evaluating the effectiveness of the various services provided by Public Works. Over time, data collected will help management better identify program successes, assess areas needing improvement and lead to improved decision making in managing program activities and promoting more efficient utilization of resources.

#### Recommendation

We recommend management develop a plan of action to implement a citizen satisfaction survey program specific to Highway and Road Maintenance performance measures and utilize the data generated to help measure program effectiveness and facilitate decision making.

#### Management's Response

In recent months a city-wide team has evaluated various options and vendors for improving the city-wide Citizen's Satisfaction Survey. Options for conducting this survey were presented to the *Invest in Employees Team*, and they will make a recommendation for action in June of 2007.

The Public Works Department has historically relied upon the City's Citizen Satisfaction Survey results, direct conversations or information obtained from citizens (such as reports in the Gainesville Sun's "Sound Off" or Letters to the Editor or emails received through the Commission, manager's offices or directly to the department) for evaluation of our services. This information is used in conjunction with information from our WMS to evaluate our service delivery.

Direct conversations with citizens, complaints received by the City Commission or City Manager's Office, and publications in the local newspaper are excellent sources of feedback that allow the department the opportunity for an immediate response. For example, the number one complaint several years ago regarding public works related services was associated with the lack of synchronization of the traffic signals throughout the urban area. This was evident from the number of references to the issue found in the Gainesville Sun's Sound Off column, Letters to the Editor, and complaints to the City Commission. This immediate source of feedback enabled us to have more intense internal discussions on how to address this issue. Recommendations were developed and presented to the City Commission and

the Metropolitan Transportation Planning Organization with sufficient documentation to garner support as the number one transportation need for the urban area. This has allowed us to develop funding partnerships with the county, state, and the University of Florida for an \$18 million project.

While these mechanisms are not formal citizen satisfaction surveys, they provide us with relevant feedback that assists us in evaluating our services and allow us to be responsive to citizen needs.

In addition, the Department has regular communication directly with citizens through our supervisors, managers, crew leaders, lead workers, and dispatchers on a daily basis. As part of our public outreach program, the Department is considering implementation of a focus survey in neighborhoods where we have recently performed services to further expand the mechanisms available to citizens and residents for providing feedback on levels of service.

## Observations Regarding General Government's Performance Measurement Program

The City Auditor's Office has been involved in reviewing the General Government performance measurement process since Fiscal Year 2003 when a joint recommendation was made by the City Manager and City Auditor for General Government to begin participation in the ICMA Comparative Performance Measurement Program. At that time, the following weaknesses of the existing performance measurement program were noted:

- No formal program or coordinating team
- Measures are presented in program plans but are not linked to any specific goals, funding levels or performance trends
- Most measures are output indicators
- Results are not helpful in decision making or program modifications
- There is no process for confirming the accuracy/validity of data
- There is no benchmarking to compare City of Gainesville services to peer communities

The following advantages of the ICMA program were identified at that time:

- Provides on-site training
- Provides templates for data collection
- Collects and "cleans" program data
- Compiles information regarding best practices among program participants
- Publishes an annual report
- Provides participants with raw data for customizing their own comparisons, graphs and reports

General Government has made significant progress since initiating the ICMA program and a number of efforts are underway to strengthen the City's program. However, based on our involvement in the Citywide program, we believe that additional attention is needed in the following areas to progress to where the City's performance measurement program can be utilized as a comprehensive, well-integrated system that provides useful, accurate and reliable performance information.

## Training, Coordination and Oversight

Collecting and recording performance data is only one step in implementing an effective performance measurement program. Although data has been collected and reported to ICMA for Fiscal Years 2003 through 2006, it does not appear that the resulting information is being utilized to evaluate program efficiency and effectiveness. Coordinated efforts are needed to transform the performance measurement program from the data collection phase to where the City can effectively utilize resulting data in assessing whether City programs are accomplishing expected results.

The Strategic Planning Division was recently created, in part, to enhance oversight and monitoring of the performance measurement program. As a result, enhanced training and communication sessions have helped departments to better understand the performance measurement model of identifying and counting what matters. The ultimate goal is for the City to more effectively measure and align results to key strategic priorities identified by the City Commission and City Manager. Additional focus has begun on establishing improvement teams and conducting periodic meetings to improve efforts. These teams can assist departments in conducting self-assessments, analyzing existing practices within the organization (internal benchmarking), identifying improvements in technological systems needed to collect data and integrating results into the decision making process.

## Integrating Performance Measurement into the Decision Making Process

A key goal of performance measurement is to fully integrate long-range strategic planning and short-term action planning with performance measure reporting and evaluation. In order to more fully integrate performance measurement into the decision making process, managers will need a better technical framework for analysis of performance measures, as the real value of the program comes from applying lessons learned from data analysis into improved work processes. Ultimately, the information provided through a performance measurement program should be used by the City Commission to set policy and by management to allocate resources.

## Achieving Benchmarking

Benchmarking is a quality improvement initiative that can reveal gaps in performance and provide an opportunity to identify areas where improvements are needed. Internal benchmarking can be utilized in comparing historical trends, departmental goals to results and internal components, such as between departments or between neighborhoods. External benchmarking is a process of comparing services and practices against peer governmental agencies. Limitations of external benchmarking include difficulties in filtering data and identifying comparable organizations to ensure that a reasonable "apples to apples" comparison is made. In addition, benchmarking only provides a comparative analysis that can suggest whether the City's achievements are similar to those of other cities. It does not by itself establish goals, targets or measures.

Regardless of the limitations, internal and external benchmarking can assist the City in accomplishing its mission of providing exceptional services to the Gainesville community. However, benchmarking with performance measurement data is not extensively utilized.

## Improving Reports and Providing Accessible Communications

The results of the performance measurement program should be periodically reported to the City Commission and made accessible to citizens in an easy to read format. The reports should be consistent and complete to be useful to the City Commission and management in making decisions and establishing accountability for results. To improve public accountability, the reports should be communicated through a variety of methods and provide relevant comparisons of performance measures to help align actual results with citizen expectations. The City's budget documents, website and annual Citizen's Report could be revised to better communicate significant performance measures and data specific to programs and services.

#### **Management's Comments**

In July of 2006, the Office of Strategic Planning was created to enhance and expand the focus on strategic initiatives, goal setting, and performance measurement/management systems, along with annexation activities and special reports/studies. Previously, the Strategic Planning function was incorporated in the Office of Management and Budget, and staff duties were split between budget functions, capital planning, and operational issues (such as performance measures). By separating the strategic planning function from the financial functions, staff will be able to focus on developing a comprehensive system of performance measurement and reporting.

Strategic Planning staff initiated numerous training sessions provided department specific support and has begun the process to hold a strategic planning retreat specifically for the performance measurement program. An example of the stepped up training efforts is the workshop that was held in May of 2007 for Public Works and Human Resources staff. This session explained the process for conducting a self-assessment of performance measures. This training was conducted by Stu Grifel, who has over 20 years

of experience in government performance measurement and management. Mr. Grifel has served as an auditor for the City of Austin, Texas, has published numerous articles and books on performance measurement, and is a Certified Internal Auditor (CIA) and a Certified Government Auditing Professional (CGAP).

Management is continuing to work on improving the reporting system for the performance measurement program. In example, department management plans include a report of quarterly performance and the Annual Performance Measurement Report will be issued to the City Commission (along with posting to the city website) within the coming weeks. It is important to keep in mind that the data is generated within the departments first, so they are able to begin analysis of their performance as soon as they complete their data collection, and do not need to wait for an analysis or report to come from Strategic Planning.

Strategic Planning staff plans to continue active participation in FBC and the development of programs. One of the predominate reasons City of Gainesville staff spearheaded the formation of Florida Benchmarking Consortium (along with the City of Orlando) was to improve the timelines of benchmarking data. The FBC is committed to sharing completed data with its participants within six months of data collection. This was recently accomplished at the Annual FBC Conference held in Orlando. Data for each service area was presented and focus groups for each service area met to assist in improving the organization and its deliverables.

One of the original service areas selected by the FBC for benchmarking was the Highway and Road Maintenance category. There has been two years of data submitted in this category, and with the growing interest in the FBC, additional comparisons should be available in the future. In addition, in the Summer of 2006, four training sessions were conducted for City staff on the use of "Pilot Works", which is the software package utilized by the FBC. This software allows departments to create customized graphs of performance measurement using the FBC data.

Strategic Planning staff is looking at the cost/benefit of continued participation in ICMA's program, and exploring other alternatives that allow for national benchmarking. As stated above by GFOA, a performance measurement system should be "based on program goals and objectives that link to a statement of program mission or purpose." When staff specifically considers ICMA's performance measurement program, this objective of a performance measurement program is not accomplished because many of the measures requested by ICMA do not reflect initiatives of the City.

In coming months, the Office of Strategic Planning has plans to add additional components to the performance measurement program. One example of these components is the creation and implementation of a template that would classify measures into categories such as "input," "efficiency," "leading indicator," or "lagging indicator." Another example would be using elements of a balance scorecard approach, such as "customer service," "process improvement," or financial" indicators to insure comprehensive reporting for each service area. Depending on the impact of recent property tax reform and its impact on the budget, progress in improving the City's performance measurement program could be delayed.