

FINAL REPORT



SEPTEMBER 2, 2011
OPERATIONAL REVIEW & ASSESSMENT OF FULTON
COUNTY GENERAL SERVICES DEPARTMENT

FULTON COUNTY, GEORGIA

JAT CONSULTING
SERVICES, INC.



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SECTION 1: EXECUTIVE SUMMARY

Fulton County General Services Department requested an Operational Review & Assessment of the Department (FC GSD) be conducted. The areas within FC GSD include:

- Director's Office
- Electrical/Electronics
- Structural
- Custodial Services
- Airport Management
- Contract Management Libraries
- Finance
- Grounds
- Building Mechanical
- HVAC
- Warehouse
- Jail
- Fleet
- Human Resources
- Land Acquisition
- Building Construction

These areas provide critical core services to the customers of the Department. This study was undertaken to ensure that operations of the Department was being conducted in an optimum manner and consistent with the best interests of the customers of FC GSD.

WORK PERFORMED

Woolpert conducted this evaluation using standardized procedures and methods that have been applied to over 80 public agencies around the United States (and beyond) over the past 15+ years. The process consisted of: 1) a desk audit of requested operational and financial information, 2) a series of interviews (with FC GSD staff and management) and observations focused on work processes, organization structure, and technology utilization, 4) process mapping of pertinent work management procedures, 5) calculation of any improvement opportunities based on application of observations to industry best practices, 6) validation of observations and calculations with Department management and staff, and 7) development and delivery of report and presentation deliverables to complete the process.

1. DESK AUDIT

The following is list of information we requested to gain a perspective of FC GSD programs and functions. Woolpert requested that items submitted consist of readily available information in digital format.

1. Organization Charts – Detailed to the divisional level
2. Budgets (Operating and Capital) – 2 years actual, next year projected - No Capital Budget
3. Five-year Capital Plan - Submitted Current Capital Projects Roster
4. Annual Report – Last two fiscal years
5. Union Agreement(s) (if any)
6. Accident/Injury Reports – Last three fiscal years
7. Performance/Productivity Measures in Use - see the 2010 Performance Metrics Report
8. Job Classifications/Descriptions - hand delivered
9. Staffing Allocations (by classification)
10. Salary Schedule
11. Training/Certification Requirements and Programs
12. List of Management Information Systems in use
13. List of Contracted Services (e.g., repairs construction, building/lawn care, paving, etc.)
14. Service Area Maps - hand delivered
15. Field Functions Performance Metrics - see 2010 Performance Metrics Report
16. Business Functions Performance Metrics (division or sub-group level)
17. Facilities and Buildings Location Map(s) - hand delivered
18. Activities Schedules/Routines
19. Equipment Inventory
20. Equipment/Facility Rental Rates
21. Department/Division/Section Reports (samples)
22. Departmental/Divisional Standard Operating Procedures (SOP)
23. Departmental/Divisional Programs Overviews (general)
24. List of Routine and Unscheduled Activities and Events (division or sub-group level)
25. Departmental/Divisional Reports (samples). Same as # 22
26. GSD's 2011 Customer Satisfaction Survey Results

Green = requested documents sent

Gold = requested document does not exist

Pink = items needed clarification

Blue = item emailed to Woolpert

Purple = items too large for upload and hand delivered to Woolpert

2. INTERNAL INTERVIEWS, FINDINGS AND OBSERVATIONS

Our process included conducting over 36 planned interviews of Department management and staff. We also observed FC GSD in action while conducting interviews and touring facilities, as well as visiting field crews on job sites. From these encounters, we were able to develop an understanding of the Department and the challenges they face, accomplishments they strive for, and culture they are creating. We collected input that was received from several meetings into the four categories of strengths, weaknesses, opportunities, and threats. Strengths and weaknesses are discussed in terms of the present, while opportunities and threats are seen as future conditions. Here are some of the key findings and observations from these encounters with FC GSD management:

CURRENT STRENGTHS:

- People
 - Team players who want to do a good job
 - Improving accountability
 - Once focused, the job gets done
- Practice
 - Beginning to resolve problems at a lower level
 - Work order prioritization scheme
 - CIP developed but priorities not fully funded
- Technology
 - Virtually everyone in management is connected (Blackberries)
 - Just completed Kronos
 - Archibus - implementing
 - Remote monitoring of some buildings

CURRENT WEAKNESSES:

- People
 - More training needed; what GSD has is mostly internal
 - Personnel policies limit flexibility
 - Travel time, workload and sufficient staff to cover work
 - Lack of succession plan/knowledge transfer
 - Personnel issues routinely take up significant portions of the day
- Practice
 - Hiring process is too lengthy
 - Need SBC to widen staff capabilities
 - Follow-through is inconsistent
 - Priority work and plans are subject to interruption
- Technology
 - Maximo cost allocation model is too complex - requires consultant intervention
 - Connectivity to monitor and control buildings is lacking
 - Reliance on spreadsheets

OPPORTUNITIES:

- People
 - Merger with Public Works - scale of economies
 - Greater use of vendor training
 - Career ladders for key positions
- Practice
 - Journeyman program as part of SBC
 - Documentation/SOPs
- Technology
 - Create a better vehicle replacement program /motor pool creation
 - Cityworks migration planned for this summer

THREATS:

The economy and finances continue to be the biggest threat

- People
 - Not having the right people in the right roles in FC GSD
 - Lack of trained staff to meet growing demand
 - Retaining good talent
 - Incentives for entry level staff
- Practice
 - Managing expectations and complaints
- Technology
 - Getting further behind in implementing technology
 - Tools and vehicle replacements

3. CALCULATIONS AND ANALYSIS

The industry best practices used for this evaluation fall under two distinct categories. One set of "O&M Best Practices" was used for the evaluation of the "Operations & Maintenance (O&M)" areas of FC GSD, which consisted of Building Mechanical, Electrical/Electronics, HVAC, Fleet, Structural and Custodial Services. Another set of "Business Services Best Practices" was used for the evaluation of the other support areas of the Department including: Director's Office, Finance, Human Resources,

Warehouse, Jail, Airport Management, Contract Management Libraries, Land Acquisition and Building Construction.

O&M best practice categories include:

- Operations and Maintenance United (OMU)
- Program-Driven Maintenance (PDM)
- Base-Load and Off-Shift Staffing
- Workforce Flexibility (WFF)
- Technology
- Strategic Organization Engagement
- Customer Advocacy
- Asset Management

Business Services best practices categories include:

- Eliminate Old, Outdated Policies & Procedures
- Routinely Acquire Customer Feedback
- Manage Information Strategically
- Manage Finances Strategically
- Utilize Resources Optimally
- Manage Service Delivery
- Manage Organization Effectiveness
- Utilize Technology Strategically

We compared the way FC GSD conducts business to these best practices as a set of “benchmarks” for this evaluation. We refer to this type of evaluation as “Practice Benchmarking” vs. “Metric Benchmarking”. Our experience has shown that practice benchmarking brings greater value to the agencies we evaluate by providing them with an understanding of the industry practices that enable high performance organizations to excel on a sustainable basis. Conversely, metric benchmarking is extremely difficult to “normalize” for geographic and other variables (that is, pipe repairing conditions in North Carolina vary greatly from pipe repairing conditions in Colorado, making these types of comparisons both challenging and of limited value given the high cost of data normalization). Furthermore, as our database has grown (we have now applied this process to over 80 public agencies), the results attain a higher level of validity - being in the top five of a list of 80 agencies is, perhaps, statistically more significant than achieving the same results when compared to a limited number of organizations during a metric benchmarking exercise.

Concerning the background of these best practices, we offer the following discussion:

The practices are compiled from best practice information, theory, and concepts that have been implemented in some of the most successful public and private agencies. They are integral measuring tools for the following programs, awards and certifications.

- American Productivity and Quality Center
- Malcolm Baldrige National Quality Award
- Deming Application Prize for Quality
- Presidential Award for Quality
- Six Sigma, Lean Six Sigma
- ISO 9001
- ISO 14001

It is important to first define “business practice”. A business practice is a habitual way of conducting work. It is “how” work is carried out, not “what” work is carried out. Best practices are those business practices that have been identified as the best approach for an organization. These are based on a variety of specific factors and evaluative criteria. There is, in fact, no single, agreed upon, comprehensive list of best practices. The best practices used in this assessment are a synthesis of the key recurring themes in the best practices body of knowledge.

These recurring themes revolve around the key areas of:

- Increased productivity
- Work-flow and processes
- Work environment (culture) and communications
- Use of resources (technology, skills, staffing, tools, finances)
- Customer focus
- Quality of work

“Benchmarking” is a term that is often used in discussions about best practices. There are a number of definitions of benchmarking. In the public sector, benchmarking may refer to metrics, or ratios of some measure. Examples include workers/square foot, #staff/1,000 customers, \$/square foot, and so on. Comparing benchmarks of this nature across agencies is generally non-productive due to differences in circumstances including geography, regional issues, and specific processes. A more productive approach is for a public agency to determine what practice performance benchmarks it will track, establish a current baseline performance level, and to compare its performance to itself over the course of time. This is “Practice Benchmarking” and is the basis for our evaluation of the Department.

4. VALIDATION

Following our analysis and resulting calculations, we conducted an extensive review of the results with FC GSD staff and management. During this review, we requested confirmation of our observations and findings - not of the calculations themselves. This review resulted in clarification of question areas we had identified during the evaluation and corrections to observations we had misinterpreted or misunderstood. As is typically the case, the validation process resulted in no adjustments to our calculations.

We found that Fulton County General Services Department operates at a level of efficiency that we describe as being close to the line that separates efficiently performing public agencies and inefficiently performing public agencies and, thus, has opportunities for significant improvement. The assessment process involved the development of a performance improvement "gap" that is calculated by dividing the total labor improvement opportunity we have identified by the labor budget of the agency. Woolpert has calculated that FC GSD has a 12.4% gap of which we are recommending to target closing over the next 2 - 5 years. By adapting or adopting the various recommendations contained in this report and based on the industry best practices we adhered to during our evaluation, FC GSD can improve their productivity by a factor of about 12.4% in 2- 5 years. That equates to a cost of service labor improvement equal to \$1,957,094 in an operating labor budget of \$15.8 M (2010). This estimated gap is below the average of the gaps we have calculated. However, FC GSD is lacking in executing customer service consistently on all fronts.

Some of the reasons for this performance rating include: 1) the agency has a strong commitment to performance measurement and management but the results may be inadvertently biased, 2) the Department does not utilize its resources effectively, and 3) FC GSD's lack of leadership in the acquisition and use of technology to support best practices. We will discuss these in depth later in this report.

5. RECOMMENDATIONS:

Our recommendations fall into three major categories: People, Practices, and Technology. Further, we have defined our recommendations as short term, intermediate, and long range in the full report so that, combined in these categories and time frames, they constitute a high-level action plan for FC GSD. Execution of this high-level action plan will support the Department's continuing efforts to optimize performance and build a sustainable model for the future.

Of the three categories of People, Practices, and Technology, the "People" category often attracts significant attention (for good reason). In that regard, our conclusion is that FC GSD could improve productivity by a factor that is equivalent to 41 FTEs (Full Time Equivalents) over a period of several (2 to 5) years, but also that FC GSD is underperforming in certain areas that require an additional 52 FTEs for a net increase of 11 FTEs. The cost of these additional resources, however, could be paid for with savings from implementing optimized energy management through full automation and integration of building control systems throughout Fulton County (these assumptions do not take into account any major shift or event that cannot be predicted at this time such as further growth of service area or unforeseen positive or negative financial trends affecting the region).

FC GSD needs to add staff to conduct Planning and Scheduling and Asset Management activities for improved preventive maintenance and optimum asset management of the County's facilities and infrastructure. Improvement in these areas will not begin until these resources are on board and contributing to the focus of maintenance and asset management optimum performance. These positions could be created from existing and vacant positions as opportunities occur and are already included in the calculations above.

This discussion leads us to a primary concern regarding FC GSD - that a significant percentage of the agency's staff could retire in the next several years placing the sustainable performance of FC GSD at risk. FC GSD needs to develop and execute a Succession Plan to ensure that the agency is prepared for this eventuality. We find that the Department, like many public agencies, is an organization that has been striving to keep up with a fast-growing economy for the past decade or longer and now, fortunately, has the time to catch up to that growth and prepare for the future more strategically. We recommend that FC GSD invest the time and resources to prepare for this coming change in the workforce today. Otherwise, the "brain drain" this exodus represents could be extremely difficult to overcome.

KEY RECOMMENDATIONS

The following high-leverage actions are recommended to enable the Department to perform at "World Class" service provider levels:

Key "Practices" Recommendations

- Develop facility-based service level agreements including operating and capital budgets
- Continue/develop programs for systematically reviewing/creating policies and procedures (including SOPs) on a regular basis
- Continue the program to make customer feedback a routine, implementing multiple avenues for acquiring feedback data (don't do this yourselves)
- Continue developing the "Balanced Scorecard" for FC GSD for each division/section, and individual staff for managing performance and accountability
- Evaluate the potential for skills training and cross-training along with SOPs to ensure consistent work production and results, include standards for productivity and work quality
- Use Mechanics position as ideal pilot for WFF and Triage to enable subject matter experts more time to focus on "Master Level" work and less time traveling
- Continue implementation of Level of Service and to develop KPIs based on Balanced Scorecard
- Review procurement procedures to ensure the "pendulum swing" is not too far in either direction - must support optimum performance
- Conduct resource loading and utilization monitoring to ensure optimum use of resources (people) - Woolpert will provide a tool...

Key "Technology" Recommendations

- Develop Technology Master Plan to identify and plan for technology integration throughout FC GSD and name an "ombudsman" to work with the IT Department
- Continue to evaluate paper consumption and identify ways to improve in this area

- Continue to evaluate and determine specific requirements for GPS and mobile data terminals (laptops) in vehicles
- Identify functional requirements to fully automate and integrate building control systems for optimized power consumption
- Develop a plan to ensure optimum fleet management for long-term maintenance/replacement cost control
- Utilize the work order process flow diagrams discussed in Section X: as a beginning point to incorporate technology to enable best practices

Key “People” Recommendations

- Design cross-training as a strategic tool, develop and train to a skill matrix - link to a skill-based compensation program
- Perform staff skills assessment and gap analysis
- Implement performance management processes that reward training and knowledge sharing
- Develop a knowledge transfer program including: content experts write SOPs, mentoring, succession planning
- Reorganize around the concept of two Assistant Directors - one for Maintenance functions and one for Administrative functions
- Develop Succession Planning to prevent “brain drain” resulting from retirements/attrition
- Reorganize FC GSD around the concept of: The Director (CEO) should be the promoter of the vision for FC GSD and should be outwardly focused on stakeholders. Two Deputy Directors (COOs) are inwardly focused and capable of engaging staff and working across divisions and unit lines for Operations and Administration.
- Create and execute Leadership Development Program to support succession planning and knowledge retention
- Develop and implement cross-training program with skills-based compensation to encourage development of a highly productive workforce
- Implement reorganization as follows:
 - Strategic Planning: Develop Strategic Plan and Operating Plan and assign FC GSD leadership according to roles and responsibilities (Strategic = CEO, Operating = COO)
 - Customer Service: Evaluate CS processes and options and develop an action plan based on development and implementation of proactive customer feedback and response program. Explore the centralization of Customer Service.

The above recommended reorganization changes are included in the previous staffing calculations.

Woolpert is pleased to respond to any questions the Department may have following review of this and other referenced documents.

SECTION 2: INTRODUCTION

FULTON COUNTY GENERAL SERVICES DEPARTMENT HAS AN INCONSISTENT TRACK RECORD OF PERFORMANCE

FC GSD is seeking to define and obtain the next level of customer service, commitment, and leadership and this assessment serves as a road map to that next level. The Department is struggling to meet the challenges of the current economic downturn in the United States as well as increasing demands of aging infrastructure with fewer staff and resources. This assessment was conducted by the Woolpert team from the perspective of a private sector service provider to determine where and to what extent performance improvement opportunities exist in the current organization as well as looking to the future. The review addresses the maintenance program and business support functions of the Department.

From April through August of 2011, the assessment was conducted to 1) determine the efficiency of the Department's current operations as compared to how a private agency contractor might operate the Department; and 2) to present and discuss the review results with the senior management team, staff and the County Manger's Office and identify areas where operational efficiencies could be obtained. The review methodology included:

- Interviews with FC GSD management and staff to determine current work practices and to quantify costs associated with those practices.
- Independent analysis and comparison of the Department's current situation with the approach used by contractors, as well as by private business services providers.
- Presentation to Department staff of the 16 most significant best practices governing public agency maintenance activities as well as business services activities.
- Resource loading analysis and process mapping of the common work management processes from work initiation through close out of planned and reactive work orders.
- Presentation to (and discussion with) staff regarding application of the best practices specifically to FC GSD, including quantified results.
- Preparation of this summary report outlining the results of the review, including implementation recommendations.

The review addressed the following areas of the General Services Department:

- Director's Office
- Electrical/Electronics
- Structural
- Custodial Services
- Airport Management
- Contract Management Libraries
- Finance
- Grounds
- Building Mechanical
- HVAC
- Warehouse
- Jail
- Fleet
- Human Resources
- Land Acquisition
- Building Construction

Interviews were conducted by five members of the Woolpert assessment team: Mike Sweeney, Brad Jurkovic, John Przybyla, Neil Bonser and Calvin Hall. The following representatives of FC GSD were interviewed to obtain information regarding current operations, costs, services, and goals, as well as future plans:

1. David Ricks, Director
2. Tomekia Mance
3. Shenelby Bailey, Financial Sys Supervisor
4. Charles Yeargin, Land Acquisitions Admin.
5. Liza Cheeks, Real Estate Specialist
6. Billy Warren, Greater Fulton Area Manager (acting)
7. Bobby Oliver, Bldg Maint Mgr
8. Mark Wade, Vector Ctrl Mgr
9. Ciro Duenas, Elect Tech Supv
10. David Randall, HVAC Team Mech Sys Supv
11. Mitchell Crumley, Bldg Mech Team Sr Bldg Mech Supv
12. Wadell Prothro, Plumbing Team Lead
13. Shomari Taylor, Equip Mech Supv, CMF
14. Airmis Thomas, Bldg Mech Mgr
15. Larry White - Grounds
16. Shelby Duncan -Grounds
17. McArthur Sheppard - Custodian
18. Daniel Holiday - Custodian
19. Larry Timmons - Welder
20. Joe Combs - Electrician
21. Josuan Jackson - Building Mechanic
22. Kent Wintter, Transportation & Logistics
23. Kier Freeman, Materials Mgmt Mgr
24. Logan Nelson, Receiving & Inventory Specialist
25. Calvin Furlow, Material Asset Supervisor
26. Calvin Gamble, Mgmt Mgr
27. Karen Hansberry-White, HR Manager (interim)
28. Karen Belton - Admin Coordinator II
29. Michael Ross, Bldg Maintenance Asst Director - Building Construction
30. Michelle Cox, Const Proj Mgr
31. Joe Davis, Sr. Const Proj Mgr
32. Mary McDonald, Admin Asst.
33. Mark Moore, Landscape Architect
34. Alfred Collins, Bldg Const Asst Director - Library Projects
35. Douglas Barrett, Airport Manager
36. Scott Brown, Supervisor Airfield Tech
37. Joseph Davis, Building Operations Manager - Jail Services

SECTION 3: BACKGROUND

FC GSD O&M STRATEGIES FOR BUILDING MECHANICAL, ELECTRICAL/ELECTRONICS, HVAC, FLEET, STRUCTURAL AND CUSTODIAL SERVICES

Through experience working with many public agencies, including large and small, public and private entities, eight major Operation and Maintenance (O&M) areas have been identified in which private and public agencies often differ. These eight areas, or strategies, are what provide private companies significant cost advantages. This review of FC GSD Operations utilized these eight strategies as the comparison yardstick for O&M. The eight strategies are as follows: operation and maintenance united, program-driven maintenance (vs. reactive maintenance), off-shift staffing, work force flexibility, technology utilization, strategic organization engagement, customer advocacy, and asset management. These strategies are defined in more detail below.

1. OPERATIONS STAFF AND MAINTENANCE STAFF UNITED (OMU) ENABLES EFFECTIVE ACHIEVEMENT OF COMMON GOALS

Public agencies have traditionally organized around two distinct work groups: Operations and Maintenance (O&M) workers. This more optimal strategy eliminates this distinction by changing the dual “O&M” work force emphasis to one of continuously improved, focused maintenance. Operators no longer “operate buildings or construction equipment” only when needed. Instead, everyone in a single work force has operation and maintenance assignments to complete while all team members are busy throughout the process.

2. PROGRAM-DRIVEN MAINTENANCE (PDM) MAXIMIZES PRODUCTIVITY AND REDUCES COSTS

Many public agencies operate in a “reactive” maintenance mode with the “if it ain’t broke, don’t fix it” philosophy predominating. The Planned Maintenance strategy focuses labor resources on planned, preventive, and predictive activities while confining reactive maintenance to a small fraction of all maintenance performed. Materials and inventory management are synchronized with planned equipment overhauls, reducing or eliminating travel time, and other similar dead time components typical of the reactive maintenance philosophy. When properly implemented and supported with integrated information systems, the Planned Maintenance management philosophy can save up to 40% of labor costs normally associated with the reactive approach for the typical public agency.

3. BASE-LOAD AND OFF-SHIFT STAFFING

Today, major operations in the private sector often run “unattended,” i.e., in the absence of personnel specifically assigned to wait and watch for alarms or calls to come in, especially during “off” shifts. By contrast, many major public agency facilities are partially or fully attended by staffs waiting and watching for alarms or calls to come in. The driving elements creating the difference between these two philosophies are the perceived risks associated with the perceived ability to respond reliably to citizen calls for service 24/7 (24 hours per day, 7 days per week).

Profit motive has provided powerful incentive for the private companies to move beyond conjecture and experimentation to full implementation of unattended staffing despite initial perceptions of risk and unreliability. Of course, this depends on the type of service and level of response automation employed by the agency. However, in all cases, these companies have been successful in reducing the number of staff attending facilities during “off” shifts. The unattended philosophy has driven them to develop business process designs that integrate reliable technologies with processes. What these companies (and a growing number of public agencies) have proven is that unattended staffing, when properly designed and implemented, is in fact, often as consistent and predictable as attended staffing strategies. These companies and public agencies have proven that the unattended staffing strategy saves money and is a reliable approach to operations.

4. WORKFORCE FLEXIBILITY (WFF) MAXIMIZES PRODUCTIVITY

Historically in the U.S., the largest single dead time factor affecting the execution of maintenance work is people waiting for people with other skills. Single-skill work systems artificially separate skills and crafts, institutionalizing “skill-waiting” dead time. Companies and progressive public agencies have shown that increasing the range of skills possessed by maintenance personnel through cross-training can reduce skill-waiting time by up to 40%. Cross-training is standardized, expedited, and individually configured through structured programs supported by multimedia-based instruction systems. On-the-job practice, procedure, and standards review and guidance are provided by knowledge-based decision support systems.

5. TECHNOLOGY IS ESSENTIAL IN MINIMIZING COSTS AND MAXIMIZING RESPONSE

Many public agencies are very cautious, viewing the use of information technologies as “risks” to be minimized. The private corporation strategy recognizes the exponentially increasing value of applying technology as a strategy to every business process within the organization. When information technology is viewed as strategic, it can be factored into every challenge, initiative, or project required for operations, maintenance, management, and administration. On an enterprise-wide basis, integrated systems allow information to be appropriately shared, facilitating continuous improvements in business processes. The corporate strategy leverages the cost-effectiveness of applied, integrated technology in many ways, for example:

- Automated monitoring and control systems
- Knowledge-based systems for facility and infrastructure maintenance management
- Advanced customer service information systems
- Technology-based training, problem analysis, and decision support

6. STRATEGIC ORGANIZATION ENGAGEMENT - FLEXIBLE ORGANIZATION EMPOWERS AND MOTIVATES EMPLOYEES

Public agencies traditionally have a hierarchical organizational structure that tends to be mechanistic, fixed, and resistant to change. Change, however, is inevitable to meet the growing demand to do more with less.

Using an orchestra as a metaphor, this sixth strategy is like the conductor providing the vision and direction for the whole orchestra and the individuals are empowered to make music on their own. The

powerful music produced is the product of all the individuals working in unison.

This strategy extends participation with the change process to all stakeholders. The organizations become flexible, team oriented, streamlined, energized and empowered. One agency saved 15% by the end of a three-year design phase by employing this strategy. Redeployment of personnel through this philosophy increases productivity, saves money, and empowers employees to be actively involved in the change process.

7. CUSTOMER ADVOCACY - MANAGING PERFORMANCE FOR CUSTOMER SATISFACTION

The contractor recognizes their customers not only as their source of revenue but also as a powerful ally within and outside of the community. To that end, successful contractors develop strong customer advocacy programs. In a number of recent instances, private contractors have used the lack of customer advocacy as an entry to public service providers. They have offered to take customer complaints "off the screen" of elected officials by implementing their new advocacy strategies.

8. ASSET MANAGEMENT - MANAGING YOUR FACILITY & INFRASTRUCTURE INVESTMENT

Public agencies understand that they are the stewards of the assets they operate and maintain. A well written contract requires contractors to return those assets to the agency at the end of their contract in equal or better condition than at the outset of the contract. As a result, they take great care to maintain the critical assets in their best operating condition.

Asset Management drives more preventive, predictive, and reliability-centered maintenance with a focus on critical assets (ones with high risk). This typically leads to significantly lower repair and collateral damage costs over the life of the assets and more satisfied customers.

BUSINESS SERVICES STRATEGIES FOR DIRECTOR'S OFFICE, FINANCE, HUMAN RESOURCES, WAREHOUSE, JAIL, AIRPORT MANAGEMENT, CONTRACT MANAGEMENT LIBRARIES, LAND ACQUISITION AND BUILDING CONSTRUCTION:

1. POLICIES AND PROCEDURES

High-performing organizations adhere to established policies and procedures. But, they are also flexible so they can respond quickly to changes. Policy and procedure impediments constrain performance. Performance improvement implementation is key as is the establishment of continuous review processes.

2. ROUTINE CUSTOMER FEEDBACK

A high-performing organization is focused on the customer and is focused on achieving high-quality service delivery at all times. Customer service performance is achieved through the development of

sound customer relations and by learning from and responding to feedback from customers (both internal and external).

3. INFORMATION MANAGEMENT

High-performing organizations incorporate information management best practices to reduce cost, improve response time, support better decisions and document and monitor performance, to name a few reasons. Information system structure, accessibility, integration and management are keys to optimum information management.

4. FINANCIAL MANAGEMENT

How an organization manages its financial resources is a major enabler of high performance. An organization's financial management supports both growth and stability. World class financial management includes strategic as well as tactical planning, automated budget tracking, and procurement and spending authorities that support the other best practices included in this section of the report.

5. RESOURCE UTILIZATION

In world class organizations, programs are designed and implemented to measure and maintain the quality of service delivery. This is important because the quality of service delivery can be an excellent measure of overall performance. Optimum service delivery is achieved through effective resource utilization with a focus on quality control, asset utilization, and workforce workload management.

6. SERVICE DELIVERY

The way you plan, monitor, and measure your service delivery is a good indicator of performance. High-performing organizations have standards to ensure levels of service delivery but can also respond to internal and external customer issues. Optimized service delivery avoids serial work processes and duplication of effort while continuously evaluating opportunities to outsource if tasks can be performed better using other resources.

7. ORGANIZATION EFFECTIVENESS

The right structure and practices need to be in place to support optimum performance. But, the organization has to be able to adapt to changes as well. Organization effectiveness is determined through the application of sound mission, vision and values as well as succession planning and employee development.

8. USE OF TECHNOLOGY

Technology is critical to high level performance. However, technology must be implemented correctly. Optimum use of technology is achieved through effective planning, extensive utilization, large-scale information access, and appropriate levels of technology support.

SECTION 4: ANALYSIS

BUILDING MECHANICAL, ELECTRICAL/ELECTRONICS, HVAC, FLEET, STRUCTURAL AND CUSTODIAL SERVICES

SUMMARY RESULTS SHOW OPPORTUNITIES TO IMPROVE PRODUCTIVITY IN THE O&M FUNCTIONS DO EXIST

The findings of this review show that significant opportunities do exist for improving the productivity of FC GSD maintenance. The study methodology was to view the various O&M and Business Services functions “through the lens” of a contract service provider of the various functions. A contractor could improve productivity beyond the present level, primarily by applying O&M strategies that are different than those used today by FC GSD. These new O&M strategies are the following:

1. OPERATIONS STAFF AND MAINTENANCE STAFF UNITED (OMU) ENABLES EFFECTIVE ACHIEVEMENT OF COMMON GOALS

A contractor would eliminate any separation between operators and maintenance staff. Everyone would be capable of performing all phases of work. No one would be “waiting and watching” for things to happen or for their turn to perform a specific task. As a result, productivity would increase.

Since this strategy is not germane to FC GSD, this strategy was not considered applicable.

2. PROGRAM-DRIVEN MAINTENANCE (PDM) MAXIMIZES PRODUCTIVITY AND REDUCES COSTS

Planning maintenance in advance of infrastructure failure is problem prevention. Reactive maintenance (“wait ‘til it breaks”) is expensive. Planning ensures that the right tools, the right skills and the right parts are in hand prior to maintenance work being accomplished. A contractor would ensure that approximately 70% of maintenance work was planned. *FC GSD maintenance is estimated at an overall average of 40% planned (not including custodial and grounds work) = 8.9% lost productivity using our standard productivity curve. Closing this gap would improve productivity by the equivalent of 19.8 FTE’s, which is rounded to 20 FTEs. This corresponds to a value of \$954,680.*

3. BASE-LOAD AND OFF-SHIFT STAFFING

A contractor would fully utilize technology and on-call arrangements to reduce staffing in the field during the swing and graveyard shifts and on weekends and holidays. Off-shift staff, when called on, would be busy doing emergency work tasks and would only be on duty if extenuating circumstances

required their presence. *FC GSD employs this strategy to nearly its fullest extent. There is an opportunity, however, to reduce overtime and improve customer responsiveness by practicing "staggered shifts" to provide enhanced customer service at a reduced cost during certain hours. As a result, a contractor would realize overtime savings.*

4. WORKFORCE FLEXIBILITY (WFF) MAXIMIZES PRODUCTIVITY

Work force flexibility means cross training of existing staff - not just within trades and crews but across trades and crews. A contractor would cross-train all staff. Cross training significantly reduces time spent waiting for specific skills and trades and allows staff to work as more flexible teams. As a result, productivity gains of 20% or more are possible.

In return for achievement of specific skills, licenses, etc., a contractor rewards employees through a skill-based compensation program. The more skills an employee attains, the more pay and/or bonuses he or she receives. As a result, everyone wins - productivity increases and employees benefit financially. *FC GSD has been addressing workforce flexibility and is gradually improving in this area but the approach has not been fully developed and formalized. Currently, we estimate that cross-training is at a 25% level in the Department (mostly within crafts and crews) which translates to a 15% productivity improvement potential = 6.7 FTEs which we round to 7 or \$334,138.*

5. TECHNOLOGY IS ESSENTIAL IN MINIMIZING COSTS AND MAXIMIZING RESPONSE TIME

Technology as a tool for maintenance primarily exists in the form of facility and system automation and work management. Facility automation via SCADA and control system technology can reduce chemical and power consumption as well as labor costs. Work management via integrated maintenance management and geographic information systems can improve productivity of staff and improve life cycle costs of assets. *FC GSD has utilized technology primarily to automate the facilities and the work of O&M functions and for asset management purposes. A computerized maintenance management system (CMMS) is being implemented (Cityworks) but it is not yet fully integrated with the geographic information system (GIS) or other systems for optimum work planning potential. Until Cityworks is implemented, FC GSD will rely on multiple computerized maintenance management systems to manage their work. A contractor would use this technology to support all of the previously mentioned strategies to optimize productivity and to minimize costs. FC GSD utilizes these technologies. However, fully automating facilities controls could result in power savings of as much as 5% = \$642,000.*

6. STRATEGIC ORGANIZATION ENGAGEMENT - FLEXIBLE ORGANIZATION EMPOWERS AND MOTIVATES EMPLOYEES

A contractor would eliminate bureaucracy and hierarchy and utilize a team approach, empowering employees and maximizing productivity. Support organizations would also be reinvented to streamline support services. A contractor's goal is to trust staff to do their jobs and to provide them with the tools

they need to maximize their productivity. This equates to organization structures that are flatter with decision-making pushed down to the lowest level possible. *A reorganization of FC GSD over time could result in improved overall performance as discussed elsewhere in this report. However, the current supervisor to worker ratio in O&M is already within industry standards and further reorganization will not likely improve this ratio. As a result, a contractor would realize no opportunity in this area.*

7. CUSTOMER ADVOCACY - MANAGING PERFORMANCE FOR CUSTOMER SATISFACTION

The contractor recognizes their customers not only as their source of revenue but also as a powerful ally within and outside of the community.

To that end, contractors develop strong customer advocacy programs. *FC GSD is somewhat proactive in their relationships with their customers and improvements have been evident under this management team but opportunities for improvement do exist. Results of those improvements cannot be quantified, however, in terms of productivity but, rather, are a matter of improving the “good will” that is integral to the relationship between public servants and the customers they serve. No gap was determined in this area.*

8. ASSET MANAGEMENT - MANAGING YOUR FACILITY & INFRASTRUCTURE INVESTMENT

A contractor understands that they are the keepers of the assets they operate and maintain. They are often required by contract to return those assets to the owner at the end of their contract in equal or better condition than at the outset of the contract. As a result, they take great care to maintain the assets in their best operating condition. This approach also reduces other costs over the long haul.

FC GSD overall is attempting to proactively manage their assets. However, many of the assets are aging and will require more maintenance to extend the life optimally. As a result, a contractor would expect to actually spend more in this area than the current level for long-term asset management. When the opportunities for improved asset management are combined with other strategy improvements noted above, a possible reorganization of FC GSD could improve work prioritization, planning and preventive maintenance - all key aspects of asset management. Specific improvement is achievable via some potential reorganization to support the implementation of the other benefits quantified in the strategies noted above but we estimate that a minimum of 52 positions that currently do not exist in the agency would be required to achieve these benefits. Those positions include maintenance staff, Planner/Schedulers, and engineering design staff - all focused on asset management (including maintenance, rehabilitation, and replacement). The net effect of this recommendation is an increase of 52 FTEs at a cost of \$2,482,168.

SUMMARY OF O&M PERFORMANCE

In total, the application of these strategies to FC GSD O&M functions to close the gap indicated the potential for an additional 25 FTEs.

This review of FC GSD O&M was based on several days of interviews, site visits to the various locations, plus review of relevant documentation supplied by FC GSD. The resulting calculations of potential improvement contained in this report certainly could be refined with further analysis; however, it is clear that improvements are possible and that those gains could be used to support improved services and management of assets and facilities.

The results of this review show that a contractor could operate FC GSD O&M slightly more efficiently and, therefore, potentially save approximately \$1,288,818 annually, by applying the eight strategies described above. However, the need for improved asset management offsets this savings potential by \$2,482,168. Savings are also available in the areas of power and overtime reductions.

DIRECTOR'S OFFICE, FINANCE, HUMAN RESOURCES, WAREHOUSE, JAIL, AIRPORT MANAGEMENT, CONTRACT MANAGEMENT LIBRARIES, LAND ACQUISITION AND BUILDING CONSTRUCTION

SUMMARY RESULTS ALSO SHOW THAT OPPORTUNITIES TO IMPROVE PRODUCTIVITY IN THE BUSINESS SERVICES FUNCTIONS DO EXIST

To evaluate the Business Services functions (applied to the remainder of the departments within FC GSD), the review team applied the 8 points listed below. These strategies reflect the organization's ability to exploit technology and teamwork within these functional business services groups. These 8 points are evaluated on a scale from an excellent score of "routinely/uniformly applied best practice" (low range score of one) to a poor score of "seldom/rarely implemented best practice" (high range score of five) and assigned a ranking for a quantitative score tabulation. In the case of this model, a higher score equates to a greater lost productivity. The total score is plotted on a chart, providing comparative results. These are the eight best practices for Business Services:

1. Eliminate Old, Outdated Policies & Procedures
2. Routinely Acquire Customer Feedback
3. Manage Information Strategically
4. Manage Finances Strategically
5. Utilize Resources Optimally
6. Manage Service Delivery
7. Manage Organization Effectiveness

8. Utilize Technology Strategically

1. OUTDATED POLICY AND PROCEDURE IMPEDIMENTS (VS. FLEXIBLE OPERATING ENVIRONMENT)

Are policies and procedures a constraint? Are existing policies and procedures a barrier to getting work accomplished? In high performance organizations, the enterprise is flexible and changes its procedures for success. The policies are indicative of a competitive industry and are focused upon getting the required work efficiently and effectively accomplished. They embrace flexibility for standards and procedures. *FC GSD policies and procedures are in various states of development but are not generally complete at this time (this applies to the maintenance functions as well). The lack of up-to-date policies and procedures can be detrimental because periodic reviews and updates supporting best practice, technology and people changes are not supported and because the lack of policies and procedures can result in inconsistent performance of work tasks. As a result, FC GSD Business Services divisions were given a score of 4 on a scale of 1 to 5 (where 1 is optimum and 5 is poor). FC GSD overcomes this potential shortfall by having a high number of skilled and long term employees in critical positions. However, as noted in this report, this is one of their greatest areas of risk due to impending retirements. For all of these eight best practice comparisons, scores above 3 indicate greater improvement opportunities while scores below 3 indicate less improvement potential. Thus, this best practice area offers greater than an average improvement potential.*

2. ROUTINELY ACQUIRE CUSTOMER FEEDBACK

Do you ask for customer feedback and does the enterprise act positively on that feedback? More effective organizations actively solicit citizen/customer feedback and use it to tune delivery of goods and services. *Customer feedback for the FC GSD Business Services divisions, as well as the maintenance functions, is not formalized although some divisions do meet regularly with internal and some external customers. Feedback is often customer-initiated. At times, these can be complaint-based. The department is conducting more proactive customer feedback acquisition in recent years through surveys. The resulting score is 3.5 indicating that this best practice area offers more than an average improvement potential.*

3. MANAGE INFORMATION STRATEGICALLY

Is information used productively to improve work quality and capabilities? Information is easily available as needed, with people properly trained to access and use the data. Data is entered one time, at the source. There are not islands of information. By contrast, when information is not easily accessible, people must interrupt their work to go get needed information, and they begin to develop their own, duplicate sources of data. *FC GSD Business Services divisions utilize some technology. However, the various systems are not all integrated. As a result, information is maintained and managed in numerous systems. The resulting score range is 4 indicating that this best practice area offers an above average improvement potential.*

4. MANAGE FINANCES STRATEGICALLY

Are financial resources managed as a major enabler for high performance? Financial management should support both growth and stability of the organization. Financial planning and budget tracking are expert knowledge areas. Procurement processes and spending authorities are optimized to support streamlined operations. *FC GSD faces challenges relating to procurement but the Budgeting process has improved as have the technologies that support these functions. A score of 3.5 for this best practice area indicates that an above average improvement potential exists.*

5. UTILIZE RESOURCES OPTIMALLY

Are there clear priorities regarding which citizen/customer requests get quick responses and what the required response time is? Are there procedures or mechanisms for obtaining additional resources when required? Do departments within the organization use Service Level Agreements (SLAs) to ensure sound business relationships and processes aimed at optimum customer service (both internal and external)? *FC GSD Business Services divisions do a good job of managing resources for high utilization. Work is assigned according to abilities and customer needs for optimum responsiveness. Service Level Agreements (SLAs), however, are not commonly used. The resulting score is 3 indicating that this best practice area offers an average improvement potential.*

6. MANAGE SERVICE DELIVERY

Do customers perceive high value in the services and products that you provide? More effective organizations tailor the delivery of goods and services to match customer expectations. They solicit regular feedback from customers, both internal and external. They are less focused on developing paper trails and more focused on customer service. Some remaining standardization of procedures will net improved services. Technology integration and utilization will also support improved customer perception. *Numerous divisions are still oriented toward paper-based processes. A document management system is not being leveraged for improving work flows and helping to optimize service. A score of 3 for this best practice area indicates that an average improvement potential exists.*

7. MANAGE ORGANIZATION EFFECTIVENESS

Does the leadership have a command and control, hierarchical, “do what you’re told” culture? Is there a perception of retribution for independent actions? More effective organizations share a common vision, and optimize staff performance with a shared perception of vision and its day-to-day manifestation. Managers allow their people to think and make decisions. *FC GSD Business Services division’s management has created good work environments. Staff understand the vision and plan for reaching the vision. Succession planning, however, is a recognized concern and a need throughout the Department. The resulting score is 3.5 indicating that this best practice area offers greater than average improvement potential.*

8. UTILIZE TECHNOLOGY STRATEGICALLY

Is technology used productively to improve work quality and capabilities? More effective organizations optimize staff performance with high dependence on productive implementation of technology. When technology is put into place, manual tasks are eliminated or changed to take advantage of the

technology. Technology decisions are based upon the ability to meet business needs. *FC GSD Business Services divisions do utilize technology. However, the technology is often not integrated and some technology is not current or yet in place nor has technology become widely mobile. As a result, staff recognizes that opportunities to streamline processes and improve performance still exist. The resulting score is 4 indicating that this best practice area offers more than average improvement potential.*

SUMMARY OF BUSINESS SERVICES EVALUATION

The application of these strategies to FC GSD Business Services functions for the Director's Office, Finance, Human Resources, Warehouse, Jail, Airport Management, Contract Management Libraries, Land Acquisition and Building Construction areas also indicated the potential for improving performance by implementing a more strategic approach to Business Services department-wide. Implementation details are addressed via recommendations contained in this report.

Our review of FC GSD Business Services functions was also based on several days of interviews, plus review of relevant documentation supplied by the Department. As with the O&M evaluation of the O&M above, the resulting Business Services evaluation contained in this report could be refined with further analysis; however, it is clear that some improvements are possible (the details of which are included in sections below) and that those gains could be used to reduce the gap and support improved services and to increase productivity by an equivalent 14 FTEs.

The results of this review show that adaptation of best practices could render FC GSD Business Services divisions slightly more efficient and, therefore, potentially save approximately \$668,276 annually, by applying the eight business services strategies described above to reduce the gap. These resources could be applied to the O&M shortfall of 25 FTEs so that only 11 additional FTEs are needed to achieve optimum performance. As with the O&M best practices, these Business Services Best Practices revealed improvement opportunities that are real and should be pursued on a near, mid and long term basis as recommended in this report.

EXTERNAL INTERVIEWS WITH CUSTOMERS OF FC GSD

Several interviews with representatives from various departments were conducted to ascertain the quality of services provided to them by FC GSD. Departments that participated include:

- Health Department
- Public Works
- Library
- Juvenile Center
- Legal Department
- Housing and Human Services
- Sheriff
- Superior Court

The interview results were consolidated and categorized into nine "quality attributes" and are summarized below.

1. RESPONSIVENESS

- The higher up we go in the GSD organization, the higher probability of results

- Sometimes the work is not passed on to the right trade
- Not sure what is happening; no updates are given to us
- Work Order (WO) process is broken at the beginning; WO's not entered
- Not using appropriate technology
- GSD is quick to get back with a response but not with actually performing the work
- Prioritizing work tends toward asking "who called?"

2. UNDERSTANDING CUSTOMER NEEDS

- Once they're here, yes
- Don't seem to prioritize effectively
- First question, "who's going to pay?"
- Don't understand that we need more than HVAC services - also roof, grounds and appearance
- David Ricks is the only one who consistently takes notes (active listening)
- Varying success at accommodating special needs

3. PROBLEM SOLVING

- People who actually show up are good
- They try but don't execute well or consistently
- Not strategic in the way GSD approaches work, they're paralyzed and try to put the fire of the day out
- We need a one-page CIP for each facility
- No comprehensive maintenance strategy
- Unaware of the consequence of not doing the work
- GSD is less adversarial; gotten better

4. PERSONNEL

- Field staff are good; we try to keep them for hours to address backlog once they arrive
- County custodial services are better than their contractor counterparts
- GSD has some skilled workers, some are not skilled

- GSD trades have an “ownership” issue - they only look at their task not the overall project
- Customer skills are uneven - it depends on who is responding; frustration, even rudeness
- Many times the average user of services gets the runaround

5. COMMUNICATIONS

- Seems like the customer has to generate all the contacts; why?
- GSD needs to review their Work Order process
- Inconsistent communications
- Hard to pin GSD staff down to a date
- Once assigned for action it falls apart; follow-up is poor

6. LEADERSHIP

- David Ricks is very responsive but others not so much; need to follow his example
- Phone people can be snippy at times and they don't seem to have access to needed information
- Have not been able to instill a sense of urgency in the entire workforce
- Need to sit down with us and work out a plan for our facilities
- Follow-up: when delegated, it gets lost; internal communication to the top is poor

7. QUALITY OF DELIVERABLES

- Once they're here they do the job well
- Quality is a lack of skills issue
- The work is not being managed effectively
- Depends entirely on who is involved; varies
- Depends on the project manager assigned
- Execution of work is inconsistent; depends on which facility

8. BUDGET/SCHEDULE/CONTROL

- Who's going to pay? Is a common question by GSD; GSD gives the impression that they do not have a budget

- Not much gets done on time; expectations are not clear and tend not to adhere to time
- Need triage of work tasks; important work needs to be done now
- A long wait time for approvals (County process)
- Work request - seems like GSD fiddles around until something happens
- Can be constrained by County Manager and BOC
- Periodic follow-up after this assessment is advised

9. VALUE

- Communication is the problem
- GSD needs to give us the real story; don't lead us on or overreach capabilities
- Pay too much for what is received; if work was planned better, it would lead to better results
- People getting served is more than financial - it's about service; GSD does not appear to always perceive this
- Usually spend the project contingency (20%) - something left out vs. unforeseen
- Top managers will stand by results; needs to trickle down

SUMMARY CUSTOMER COMMENTS

Most difficult challenges

- Safe and secure facilities
- Maintained and capitalized facilities
- Get out of the weeds of micro-managing
- Trend that will affect services
- Large aging population - more services and facilities

Additional services

- Customer service culture

An overall rating score of 2.9 on scale of 1 - 5 (slightly below average) resulted. Since an average score tends to denote that the likelihood of exploring the services of another service provider is high, if one is available, Woolpert recommends setting an interim goal of 4.0 (above average) on the way to a 5.0.

SECTION 5: RESULT DETAILS

Information about the Fulton County General Services Department costs, staffing levels, work rules, finances, and current use of technology and information systems was gathered from interviews and review of documentation provided by Department staff. The documentation included budgets and expenditures for labor and materials, as well as organization charts, job descriptions, and staffing history. Cost saving and productivity improvement opportunities were reviewed in comparison with each of the eight O&M strategies and the eight business services strategies. This Section contains a summary of the results.

It is important to note that the purpose of this review was to look for opportunities for improvement, not to criticize. A comparison of FC GSD's operations versus a best practices approach potentially pursued by contractors provides a target.

The current practices within FC GSD result in a high level of service to their customers. FC GSD staff are hardworking and dedicated. There are some changes that could be made, however, to improve productivity and enable staff to be more efficient and effective.

The findings in this report are based on a multi-week review including interviews and an audit of documentation provided by FC GSD, as well as comparison to similar agencies. Further analysis is required to refine these findings and to develop a detailed plan of action to increase FC GSD performance, as compared to how contracting firms might provide similar services. These results were presented to FC GSD management and staff on August 5, 2011 using the slides appended to this report. Calculations in this section have been modified slightly from those contained in earlier versions of the slide presentation, based on further analysis of the data and input from FC GSD staff.

The following average burdened salary (salary plus benefits) was used for the review:

FC GSD Staff = \$47,734/year

OBSERVATIONS SHOW OPPORTUNITIES FOR IMPROVED PRODUCTIVITY

The following observations were recorded based on interviews and analysis of data provided by the Department.

GENERAL OBSERVATIONS

- The Department provides a low end of efficiently performing public agencies with opportunities for significant improvement. The customers include the citizens of Fulton County and various departments comprising Fulton County Government. A contractor may meet all legal and regulatory requirements, but might reduce costs by not providing the quality of product and service in some areas as is currently provided by FC GSD.
- From a regional perspective the Department provides wages and benefits for FC GSD employees at a marginally competitive level. Staff has reportedly not received pay increases for four years while personal costs have continued to rise. The current system in place requires staff to

leave before others can be promoted to higher-paying positions - this could lead to recruitment challenges as the aging workforce retires, the economy improves and new employees are sought. A better approach is to provide a skilled-based compensation program wherein employees are compensated for additional skills acquired based on the needs of the agency. This approach could result over time in a highly skilled, flexible workforce participating in a program that enables them to progress at their own pace through a competitive wage system.

- A significant percentage of the workforce could retire in the next few years. This presents a significant risk to the sustainability of services to the customers of FC GSD. A Succession Plan should be developed and executed to address this critical issue.
- Policy and procedure updates have greatly slowed due to shortage of resources. Again, these efforts should continue as policies and procedures are important tools for capturing knowledge in advance of the retirements that will occur in the near future.
- FC GSD is currently budgeted for 331 Full Time Equivalent (FTEs).
- The supervisor/manager to worker ratio is 1:11.7 which is essentially at ideal ratio of 1:10. This indicates little opportunity to reduce overhead and flatten the organization.
- The total annual operating budget (not including debt reduction and capital costs) is \$41,600,000 (2010). Of that, \$15,800,000 (or 38%) is spent on labor. That number is close to the average for businesses similar to FC GSD. As noted above, this calculates to an average burdened salary (salary plus benefits) of \$47,734/yr.

Based on the observations described above as well as the details in this and other sections of this report, the Department should consider adapting or adopting the new strategies described in Section 2 of this report. Doing so will provide improved performance and potentially lower costs and will help the Department sustain performance through the upcoming period that is likely to be defined by economic recovery as well as institutional knowledge loss due to retirements.

O&M CALCULATIONS QUANTIFY POTENTIAL IMPROVEMENT

The calculations developed in this section result from viewing FC GSD as a contractor would. The calculations are derived by applying each strategy to the agency's present business practices.

1. OPERATION STAFF AND MAINTENANCE STAFF UNITED (OMU) OPPORTUNITIES

Since this strategy is not germane to FC GSD, this strategy was not considered applicable.

$0 \text{ FTE's} \times \$47,734^*/\text{year} = \0

* \$47,734 = burdened salary for FC GSD staff.

2. PROGRAM-DRIVEN MAINTENANCE (PDM) OPPORTUNITIES

The curve in Figure 1 shows the relationship of the total cost of maintenance to the percentage of work that is planned in advance of infrastructure or equipment failure (vs. reactive maintenance, which waits for things to break). This curve has been developed from maintenance experience in both the private and public sectors and is the model used by the private contractors and public agencies.

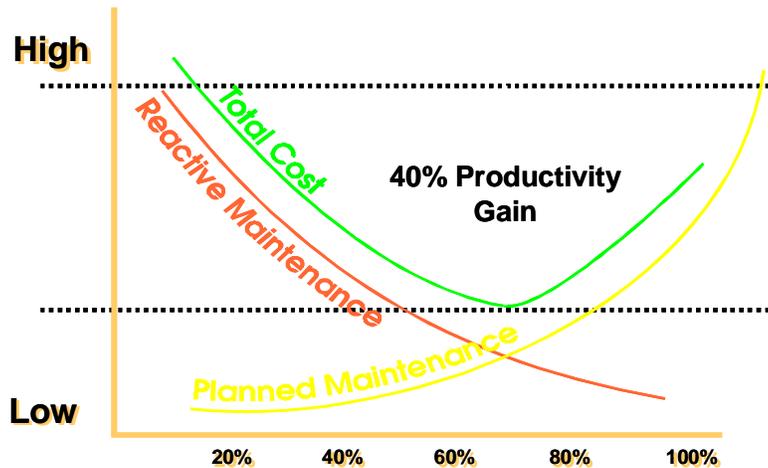


Figure 1: Level of Work Planned in Advance of Equipment Failure

The curve shows that maintenance costs can be cut by 40% at the optimum level of 75% of maintenance work planned in advance. The reason for these savings is that planning maintenance in advance reduces waiting time for parts, crafts, and other resources which in turn increases “wrench on bolt” time or time “on task”. Agencies and industries using this approach have seen an increase in “productive time” from a typical 2.5 hrs/day to 4.5 hrs/day, or an 80% increase in productivity. “Productive time” is defined as time **not** including travel time, setup and breakdown time, and time spent in meetings and other activities as well as vacation, holiday, and other time off.

FC GSD O&M is estimated to be at the 40% preventive/planned level. This estimation is based on feedback from interviews. Maintenance staff do conduct regular planning meetings but infrastructure is aging and fails causing planned maintenance to be postponed. Further productivity increases are possible in this area.

- Custodial: 80% PM = no improvement opportunity (100.5 FTEs) = 0 FTEs
- Mechanical: 25% PM = 25% opportunity, (11.5 FTEs) = 2.875 FTEs
- Electric/Electronic: 70% PM = 5% opportunity, (16.5 FTEs) = .825 FTE
- HVAC: 10% PM = 40% opportunity, (11.5 FTEs) = 4.6 FTEs
- Grounds: 75% PM = no opportunity, (39 FTEs) = 0 FTEs
- Airport: 25% PM = 25% opportunity (2 FTEs) = .5 FTE
- Structural: 10% = 40% opportunity, (23 FTEs) = 9.2 FTEs

- Fleet: 50% = 10% opportunity, (18 FTEs) = 1.8 FTEs

222 maintenance positions x 8.9% overall productivity improvement opportunity = 19.8 FTEs productivity improvement potential

The net result of achieving 75% planned maintenance would be an estimated 8.9% increase in productivity for O&M. This translates into increased efficiency equal to having an additional 19.8 rounded to 20 FTE's in maintenance.

20 FTEs x \$47,734*/year = \$954,680/year

* \$47,734 = *burdened salary for FC GSD staff.*

3. BASE-LOAD AND OFF-SHIFT STAFFING OPPORTUNITIES

The “unattended” or off-shift staffing strategy is the concept of minimizing the staffing on the off shifts, as compared to moving from O vs. M to O&M united in the first strategy, which seeks to make more efficient use of staff on day-shift crews. A high degree of reliance on automation, call-in systems, and remote monitoring systems is required to reduce the amount of attendance in some instances. Observations include:

- *Custodial work two shifts*
- *Few call-outs overnight occur*
- *Most staff work days Monday-Friday*
- *Some shifts are staggered*
- *Currently, no non-emergency overtime is allowed*

Note: Working more 4 x 10s and staggered shifts in field is beneficial because it reduces relative time for mobilization and demobilization and reduces overtime in late afternoon/evening

FC GSD is operating near optimally regarding this strategy - no significant productivity improvement potential would be observed

\$0 savings potential

4. WORKFORCE FLEXIBILITY (WFF) OPPORTUNITIES

Staff is no longer confined to one skill set or one functional area e.g., mechanical maintenance, vacuum truck operation, meter repair, etc. As staff is cross-trained in multiple areas, the circles overlap and a larger number of staff are available to work in all functional areas as needed. A “sweet spot,” the crossover of all functional areas illustrated in red (figure 2), is the goal of work force flexibility. This sweet spot represents staff who are trained across multiple skills, provide added value to the organization, and are often compensated according to their skill sets.

For FC GSD, cross-training is not formalized and crew members cannot move from one section to another unless vacancies occur. As a result, significant opportunity for improvement still exists. We estimate FC GSD is 25 % cross-trained = 15% productivity improvement opportunity per the graph on

Figure 1. Prior strategies resulted in 44.7 FTEs in various building maintenance groups for this calculation

- $44.7 \text{ FTEs} \times 15\% \text{ productivity improvement opportunity} = 6.7 \text{ FTE productivity improvement potential}$

Figure 2 illustrates the goal of work force flexibility-increased productivity. As part of this strategy, the idea of skills-based compensation allows employees to be paid based on their level and diversity of skills. The highest paid employees directly impact productivity measures by providing the most benefit by being skilled in multiple areas.

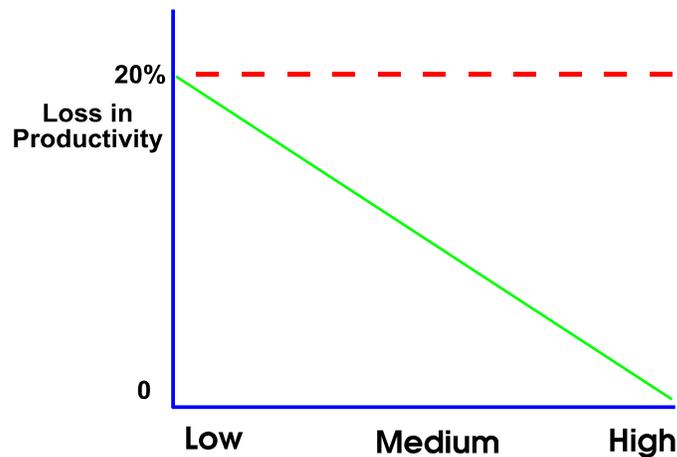


Figure 2: Degree of Work Force Flexibility Implemented

Figure 3 further illustrates the common benefits of work force flexibility. Since people have multiple skills, waiting time is reduced, productivity increases, labor and dollars are saved, and morale is improved since employees are learning and doing new things.

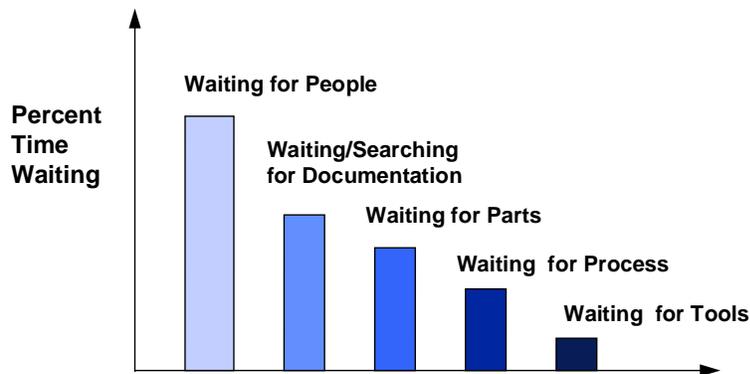


Figure 3: Work Force Flexibility Reduces Wait Times

Over a longer period of time, implementing integrated work teams are recommended to replace the current segregated Operations Department.

Each work team (or worker) would be assigned to perform work and would be cross-trained in the various areas of Operations responsibility. Each worker would remain a specialist in their current area. Team members would receive pay based on the levels they have attained in each skill area.

As noted above, assessment results estimate that a 15% productivity increase could result from implementation of a WFF program. The potential efficiency increase is therefore 6.7 rounded to 7 FTEs.

$7 \text{ FTEs} \times \$47,734^*/\text{year} = \$334,138/\text{year}$
--

* \$47,734 = burdened salary for FC GSD staff.

5. TECHNOLOGY OPPORTUNITIES

Leverage the CMMS, GIS and other systems to deploy Asset Management strategies for optimum asset life cycle costing/ROI. The opportunity to merge geographic information and maintenance management systems is significant. The performance improvement potential associated with these changes has been calculated into the previous strategy opportunities, so a calculated savings is not included in this gap calculation.

Numerous opportunities exist to improve technology utilization at FC GSD. Implementation of technology can improve performance by reducing power by a conservative estimate of 5% (\$642K) with full facility monitoring and control. Note that technology is just another tool that can only support the practices in place - if practices are not "best practices", the risk is just "paving the cow-path".

It is not possible to determine the value of labor saving opportunities prior to implementation of "best practices" - no productivity improvement potential was observed (0 FTEs). One-time automation costs and future maintenance costs would be required - savings result from energy optimization and improved rates.

$\$642,000/\text{year}$ power savings potential

6. STRATEGIC ORGANIZATION ENGAGEMENT OPPORTUNITIES

Moving from Organization as Structure to Organization as Strategy includes reducing hierarchy, team building, empowering employees, and moving toward self-directed work teams.

Current manager to worker ratio in Operations (19 supervisors/managers to 222 workers and working foremen) = 1:11.7 ratio, however, prior strategies would change staffing from 222 to 195 so new ratio would be 1:10.2. The optimum ratio is 1:10, so using a 1:10 ratio as a goal, productivity improvement potential would be 0 FTEs over time. Obviously, no change in supervisor ratios is recommended.

$0 \text{ FTE} \times \$47,734^*/\text{year} = \$0/\text{year}$

* \$47,734 = burdened salary for FC GSD staff.

7. CUSTOMER ADVOCACY OPPORTUNITIES

An opportunity to improve customer advocacy exists in nearly every public agency. While this strategy does not typically result in quantifiable productivity improvements, it is an important strategy to

ensure organization stability during changing times.

Today, FC GSD provides an uneven level of customer service and that has been slightly improving under the current management team and new Department. Managing customer relations and resources, empowering staff and educating them for optimum customer service, and learning to anticipate customer needs is essential in today's world of higher customer expectations.

Customer ratings are collected regularly through surveying (but the current process indicates different anecdotal needs for improvement from this assessment):

- *There is a much greater need to keep customers more informed*
- *Follow through on work requests is lacking*
- *Employees don't know what the customer satisfaction scores are or what to do to improve them*
- *More customer service training would be beneficial*

Customer feedback improvement potential exists but it is not possible to readily translate into opportunities for FC GSD (0 FTEs).

8. ASSET MANAGEMENT OPPORTUNITIES

FC GSD O&M is trying to manage the assets for which they are responsible. The use of technologies available in support of that work is not fully effective. There is an opportunity to take asset management to a new level within the Department by reorganizing and assigning staff dedicated to advanced asset management, the planning and scheduling of preventive maintenance, and design of replacement assets as infrastructure ages over the coming years. Also, budgeting on a facility basis vs. a maintenance service basis (i.e. roofs, HVAC, etc.) will encourage a better understanding between customers and FC GSD as to a balance between the immediate needs (repairs and emergencies) and the long-term needs of the infrastructure. This balance will help control costs, improve customer communications and optimize productivity of crews in support of the other strategies discussed earlier in this section of the report.

To achieve a higher level of performance as an Asset Management organization, FC GSD will need to address the six key AM functions to a greater depth than currently. Those AM functions are: Asset Inventory, Asset Criticality, Levels of Service, Asset Condition, Planned Maintenance, and Asset Life Cycle Cost Management. FC GSD has some AM staff - but Planner/Schedulers are needed to dedicate more focus to AM to achieve improvement in these areas. A core team focused on asset management should be created to work with O&M staff in support of AM best practices.

There is a 20% to 30% "gap" in asset management/performance (about 1/3 short of completing backlog as needed, need to move from a customer rating of 2.9 to a rating of 4 based on our customer interviews. As mentioned, an AM Team should be created with Planner/Schedulers and O&M Subject Matter Experts to develop and sustain AM strategies for all critical assets.

- 20% "gap" in services provided by the 223 FTEs in O&M = 46 FTEs needed to close the AM gap
- AM Team requires 6 FTEs for establishing the AM strategies and implementing throughout
- A total of 52 FTEs are needed to fill these two AM "gaps"

The net effect of this recommendation is the addition of 52 FTEs to support optimum asset management.

52 FTE x \$47,734*/year = \$2,482,168/year in additional costs
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* \$47,734 = burdened salary for FC GSD staff.

O&M SUMMARY FOR OPERATIONS

Looking back on the calculations for these eight strategies, the total opportunity for O&M performance improvement amounts to a net 25 FTEs needed to meet the estimated work demand $52 - (20 + 7)$ or $\$2,482,168 - \$1,288,818 = \$1,193,350$.

BUSINESS SERVICES OPPORTUNITIES FOR DIRECTOR'S OFFICE, FINANCE, HUMAN RESOURCES, WAREHOUSE, JAIL, AIRPORT MANAGEMENT, CONTRACT MANAGEMENT LIBRARIES, LAND ACQUISITION AND BUILDING CONSTRUCTION

FC GSD Business Services were reviewed using eight best practices considered to be "universal" to public agency business services.

1. POLICIES AND PROCEDURES

FC GSD has some established policies and procedures but the need for a process for updating the existing ones and creating new ones is acute. Some processes are currently under review. A formalized update/development program with a focus on internal and external customer service is in order.

Specifics include: Memoranda of Understanding between departments exist but are not enforced. Kronos has introduced automated clock-in but procedures still require travel. Receiving is not automated and deliveries are a challenge. Purchasing and budget processes involve much red tape, data re-entry is required between TM2 and AMS and it is paper-intensive. Policies and procedures are written and up to date for Jail due to it being a requirement by the contract operator.

2. ROUTINE CUSTOMER FEEDBACK

Customer feedback at FC GSD has been typically customer-initiated and complaint-based. Quarterly surveys of customer departments are occurring but divisions are not getting feedback or not conducting any formal programs internally. Generally a passive approach to obtaining feedback predominates.

3. INFORMATION MANAGEMENT

Similar to many public agencies, FC GSD still relies on various systems and on paper for certain processes. Additionally, systems are not integrated. These realities lead to manual data handling/management and inefficient practices. Some systems are outdated making integration an even greater challenge. These opportunities should garner substantial information management

improvements.

FC GSD uses AMS for financial data access. Archibus is replacing the existing asset management program. Standalone spreadsheets and databases are widely used. The lack of integration causes an increase in the steps needed, and double entries are required for completion of these processes. Bar coding was instituted but is currently not working.

Maintenance staff reports that they have limited access to financial data, .Technology is generally outdated and poor web access exists.

Observations of administrative uses of information showed that AMS is difficult to use, some staff use personal software where possible to save time, and information on the network access drive is not standardized. Thus, multiple and manual systems are present that are not integrated resulting in duplication of effort and risk of data loss.

4. FINANCIAL MANAGEMENT

FC GSD employs some automated financial practices and systems as mentioned but the procurement processes can be cumbersome and cause significant delays; purchasing takes anywhere from 6 weeks to 4 months. FC GSD is not part of State Contracts program; spreadsheets for tracking are widely used and Master Contracts are utilized where possible. P-card can be used for purchases below \$2,500, but its usage and resultant data management and reconciliation process are cumbersome.

Budget process is considered lengthy and involves division heads, managers, and leads.

FC GSD staff should work together to develop a program to ensure that the systems, processes, and procedures that FC GSD uses are timely and up to date and that financial data is being shared throughout the Department to increase the level of financial awareness.

5. RESOURCE UTILIZATION

Resource utilization looks at two opportunities: 1) how the use of internal resources is planned and, 2) how service level agreements (SLAs) are leveraged for performance optimization. Regarding internal resource utilization, FC GSD practices reactive resource management in most instances (although automation and improved technology integrations could be used for positioning more proactive resource utilization). However, service level agreements (SLAs) or Memoranda of Understanding are not commonly used or “enforced” but seen as something that would improve performance in several areas. Enacting them on a facility basis will significantly improve planning and customer communication and involvement.

Additionally, no succession planning or systematic knowledge transfer is taking place. There are no formal QA/QC programs and no back-up plan for absences.

In addition, there is a lack of inventory QA/QC, lack of training and inventory is hoarded in field and not readily shared.

Assignments can come from above (Directors/Council) with little warning. Some QA/QC programs are in place but are not systematic or consistent. FC GSD is not strategic in the way work assignments are approached.

6. SERVICE DELIVERY

Service delivery is at the heart of FC GSD's business. In some areas, FC GSD is comparing itself to the private sector to ensure that service delivery is optimal. In other areas, old and outdated processes that rely on paper trails and multiple serial steps in processes add to the cost and time to deliver critical services. The lack of procedures leads to inconsistent work performance in some instances and there is a general desire to develop better practices in this regard. Integration of operational systems (AMS and eventually Cityworks) with financial systems is a remaining opportunity.

7. ORGANIZATION EFFECTIVENESS

FC GSD is often a stressful working environment for its employees. The work place can be collaborative but reactive work is taking its toll by sapping the time and energy needed to plan and coordinate. Travel time to and from locations is a significant loss of productivity. Lack of salary increases, advancement and succession planning are major concerns in virtually every area of FC GSD. These issues are discussed in greater detail elsewhere in this report.

8. USE OF TECHNOLOGY

Productivity and cost savings drive public agencies to use technology optimally. FC GSD is no exception to this observation. But, there are instances where technology has not yet been fully deployed or integrated in support of best practices. Additionally, not everyone has convenient access to technologies, nor does everyone know how to fully use it. Progress appears to be incremental due largely, perhaps, to the current economic challenges we all face resulting from the "Great Recession". As part of developing a Technology Master Plan, FC GSD should make technology optimization a strategic initiative to support all other best practices advancements targeted as a result of this evaluation.

BUSINESS SERVICES SUMMARY

Looking back on the calculations for these eight strategies, the total opportunity for Business Services performance improvement amounts to the equivalent of 14 FTEs or \$668,276.

OVERALL COMBINED O&M AND BUSINESS SERVICES SUMMARY

Recalling from above, O&M performance improvements offset a work demand representing 52 additional FTEs amounted to a net 25 FTEs needed or \$1,193,350. The total opportunity for Business Services improvements amounted to a productivity gap of 14 FTEs or \$668,276. When the opportunities from O&M and Business Services are combined, the total improvement potential is \$ 525,074. The potential power savings gain of \$642,000 results in \$116,926 to cover the initial expenses to pursue said savings. The remainder of this report will be focused on recommendations to capture the productivity opportunities highlighted above.

SECTION 6: WORKFLOW ANALYSIS

FC GSD desired to have a high level business model of the respective segment of the Department in order to define workflows for modeling. Woolpert met with the Department Management to select the staff representing most areas of the Department to participate in the Model Development as well as participate in a "Resource Loading Analysis".

The resultant high level business model (available as part of the Section 11: Supplemental Materials) identifies and presents the relationships between the assets, customers, internal and external stakeholders and technologies available to provide customer services.

The Resource Loading work session involves the capture of information concerning the predominant work processes to enable an ordering of work according to the 80/20 Rule (or Pareto Principle) that suggests roughly 80% of resources are consumed performing 20% of tasks. This principle indicates defining that 20% of tasks will narrow the focus for process modeling so that gains realized during select modeling can be most beneficial to the Department.

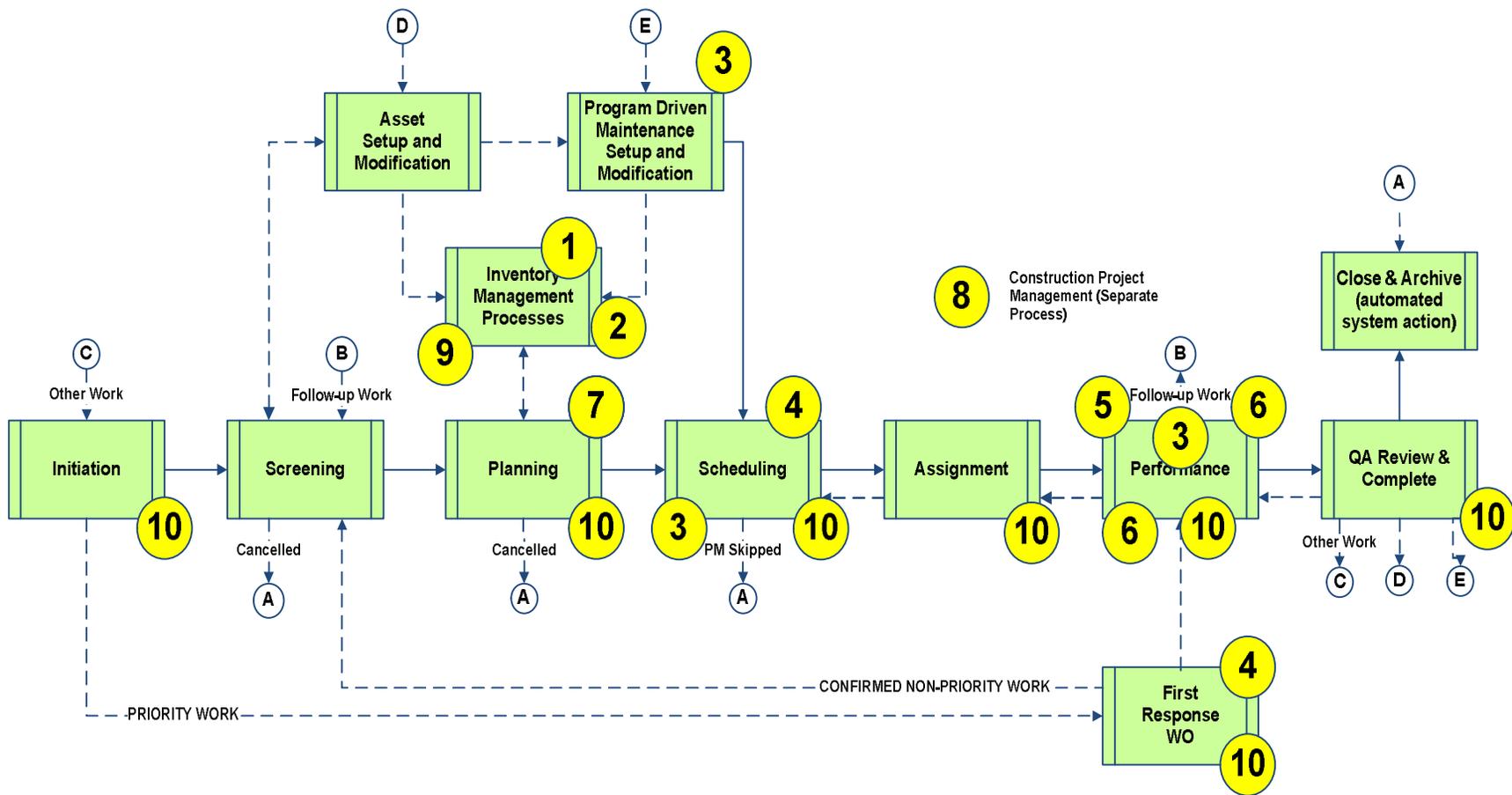
Using the resource loading outputs as guides, Woolpert then facilitated the Team's identification of high-level workflows reflecting the significant work of the Department. The results (available as part of the Section 11: Supplemental Materials) show that activities associated with work order processes highlighted in yellow on the following page predominate and are commonly pursued by the core business.

RESOURCE LOADING OUTPUTS

1. Procurement - small/large/capital
2. Payment of Invoices
3. Preventive Maintenance/Predictive Maintenance
4. Inspections
5. Corrective Maintenance/Troubleshooting
6. Installs/Project Work
7. Work Planning
8. Construction Management
9. Inventory/Procurement/Payment
10. Customer Communications

This finding provided a means to develop a comprehensive "trial balloon" work order process from our subsequent discussions with FC GSD staff in July. They serve as a basis to initiate improved business practices and goals as part of the Cityworks and Archibus initiatives as well as a means to incorporate the recommendations identified in this report.

The flow diagram on the following page depicts the 12 major Work Order processes. The number designators in yellow in the diagram correspond to the relationship(s) that the list of resource loading outputs above has with the individual work processes.



The following is a brief description of each process. Every opportunity was reviewed to eliminate paper or the number of steps in each process.

Initiation Process - A problem is noticed or work that is needed is identified; requests for work are recorded; this process was designed to accommodate a wide variety of ways WASD is notified, including telephone, email and various automated systems.

First Responder/Emergency Work Performance Process- Used for first response or “triage” when an urgent call is received; helps to ensure that individuals who need to be involved are notified and that expedient corrective action is taken.

Screening Process- Work Requests are reviewed to determine legitimacy of the work requested and completeness of the information provided. Duplicate requests are identified and managed; this process was designed to eliminate duplicate work or service requests, which is a current problem.

Planning Process-Work Orders requiring formal planning; increases maintenance efficiencies by having the skills coordinated and the materials available before the assignment of work. Currently, maintenance work tends to be very reactive. This process is designed to take advantage of the features of technology to plan, organize and manage the work and backlog.

Scheduling and Assigning Processes- Ensures availability of personnel and parts before Work Orders are scheduled and assigned. Work from the schedule is assigned. The design of this process includes a “checklist” approach necessary to incorporate the multitude of manual decision processes needed to schedule and complete the work.

Performance Process- After a Work Order has been assigned, this step ensures that the work is performed in a consistent manner and that necessary work steps are executed. Featured here is the ability to access the parts needed, capture labor and other costs, and perform a standard site survey.

QA/QC Process- After the tasks on a Work Order have been completed; helps to ensure that an analysis of the problem or the Preventive Maintenance (PM) or Predictive Maintenance (PdM) job plan is conducted, if necessary, and that needed corrective action is taken. This process also includes the approval and close out and the ability to re-open a work order to add or correct information.

PM/PdM Maintenance Process - Used when a new PM or PdM job plan is needed, or when changes are needed to an existing one; helps to ensure that the proper type and amount of preventive maintenance is defined and implemented for an asset, based on its characteristics and priority.

Asset and Spare Parts Setup Process - Used for setting up new or existing assets in Infor EAM and when new parts (items not already set-up in inventory) are identified and need to be set-up for use by maintenance. This is designed to be a collaborative process involving Stores, Engineering and uses profiles of asset class and category and associate required documentation.

Materials Management Processes- Several processes, including a PR/PO (Requisition) Process.

Generally, these processes document the steps used to identify parts or materials needing to be purchased for a job; helps to ensure that order requests are processed in a timely manner and following established guidelines.

SECTION 7: ORGANIZATION STRUCTURE

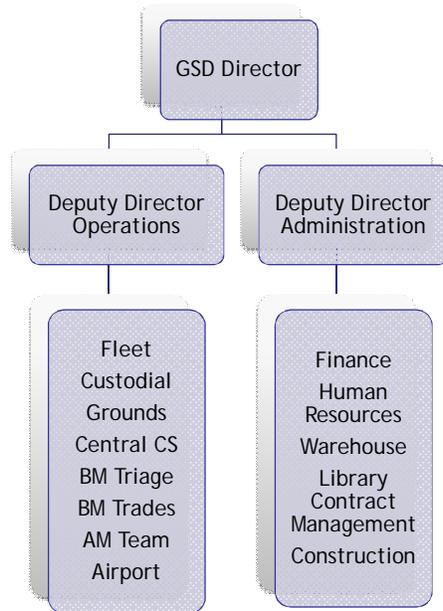
The Business Services issues discussed in prior sections of this report require additional recommendations to support the implementation of other key actions contained herein. Those recommendations include a change in the management team makeup to add an Operations Department Director position and the addition of four critical positions in support of future initiatives recommended in this report. In consideration of these items, we offer the following recommendations:

Reorganize FC GSD by adding two Deputy Directors over Operations and Administration. The Deputy Directors should be inwardly focused and capable of engaging staff. This arrangement would allow the Director to focus on managing that department. Attributes of the Deputy Directors vs. the Department Director typically are:

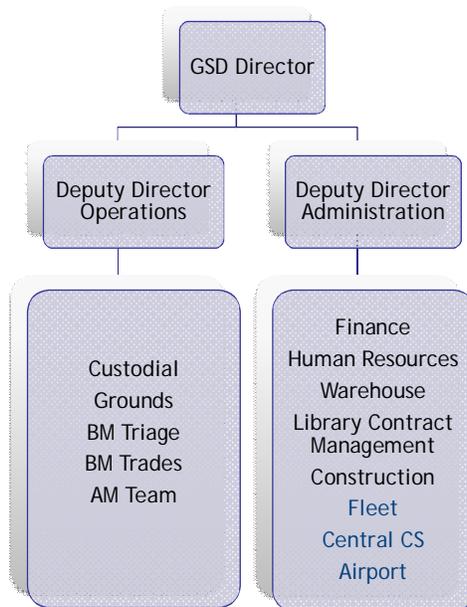
<u>Deputy Directors</u>	<u>Department Director</u>
Management Professional	Management Professional
Oriented to working in teams	Oriented to motivating individuals
Detail-oriented	Strategist
Adaptable to changes	Provides stability during chaos
Sets high standards	Coaches to achieve standards
Shows others how to achieve	Influences others to achieve
Effective communication	Effective communication
Simplify issues for decision-making	Pushes decision-making down
Coaching-facilitating style	Mentoring style

The organization charts below depict this structure in two alternatives that differ by the divisions and areas assigned. Alternative A has the advantage of best alignment with the divisions and areas directly responsible for large asset maintenance and management. Alternative B is presented so that the scenario is more balanced by the number of reporting FTEs.

Alternative A: Possible Restructure into Two Separate Divisions with Functional Alignment Emphasis



Alternative B: Possible Restructure into Two Separate Divisions with FTE Balance



Further Organizational Structure General Considerations

- Potential merger points with Public Works
 - Customer Service - centralized customer service provides an opportunity to standardize services, provides back-up and an opportunity to further consolidate
 - Human Resources - though Public Works was not assessed as part of this project, the likelihood is high that their policies and procedures are similar, if not identical with GSD.
- Functional Goals
 - Building mechanics/triage and trades:
 - Triage Team- Jack-of-all-trades-master-of-none
 - Trades Teams- Jack-of-all-trades-master-of-one
- Geography
 - Centralized Customer Service
 - Zones deployment
- Land
 - Consider move to Housing and Community Services

SECTION 8: PERFORMANCE MEASURES

APPLYING THE BALANCED SCORECARD AND KEY PERFORMANCE INDICATORS TO YOUR BUSINESS MODEL

FC GSD has a complex business model that needs to be well-executed for the benefit of many other departments and the citizens of Fulton County. And to ensure a high level of performance, it is essential that we measure the right results. Business has been using the “Balanced Scorecard” to determine performance measures for some time. More public agencies are using the tool every day. Paul R. Niven’s recent work around balanced scorecard usage in government proves that the concepts and philosophies are valid in the public sector.

His work suggests that developing a balanced scorecard is achieved in two phases: Planning and Development. In the planning phase, the organization develops the rationale for the balanced scorecard, forms a team to guide the process, and develops a plan for creating the balanced scorecard including identification of resources and schedule. In the development phase, the organization gathers information, gets input from members of the workforce, develops a draft set of measures, establishes

performance targets, and begins collecting performance data. The process does not end at that point. Rather, evaluating the data and changing the scorecard as circumstances require becomes an ongoing effort.

The work of Norton and Kaplan as well as that of Niven indicate that there are four aspects, or measurement areas, to the balanced scorecard. They are:

1. Financial
2. Customer
3. Employee Learning and Growth
4. Internal Process

However, the recent work of David Parmenter indicates that two other focus areas should be included. Those are:

5. Environment/Community
6. Employee Satisfaction

Note that these additions create two focus areas involving organization staff (Employee Learning and Growth, Employee Satisfaction). This is driven by the understanding that engaged staff are responsible for the majority of the good things that happen within most organizations. They are the ones looking for ways to lower costs, provide exceptional customer service, improve performance, and support community sustainability.

Ultimately, the balanced scorecard concept teaches us three important lessons. First, that performance cannot be measured from one perspective only. For example, an organization focused only on reducing costs can potentially suffer poor customer satisfaction and employee morale. The consequence of this cost reduction could be a reduction in service and negative customer interactions with employees. Second, we learn that measuring is easy, but measuring the right things is hard. For instance, on time departures of planes from the gate can result in unhappy travelers due to sitting on planes for hours waiting to lift off from the tarmac. And third, we understand that there must be a strong and direct link between tactical performance measures and the mission, vision, and goals of the organization. Without this connection, workers do not see the link between their daily performance of tactics and the strategic purpose of the organization. As a result, underperformance occurs.

The following diagram shows the relationship between individual performance measures and organization performance goals:

From Mission & Vision to Performance Measurement



Apart from the relationships indicated within this graph, another important performance measurement practice is evident: limit the measured criteria to keep the process manageable. The “10/80/10” rule shown in the model indicates that no more than ten Key Result Indicators (KRIs), 80 Performance Indicators (PIs), and ten Key Performance Indicators (KPIs) are appropriate for most business models. A KRI tells us how we have performed - it is an indicator of the past. A PI tells us what we need to do. And a KPI tells us what to do to improve performance. KRI areas include: Customer satisfaction, Employee satisfaction, Return on investment - they result from many actions taken. PIs include: Profit on key products or services, Number of employees contributing suggestions - they lie beneath KRIs. KPIs focus on aspects of performance most critical to current and future success - they have seven characteristics, as shown below:

KPI Characteristics

- Most are non-financial
- Measured frequently (as often as daily or continuously)

- Acted on by the SMT quickly
- Staff understand the measure and corrective action needed
- Ties responsibility to individual and small team
- Have significant impact (affects critical success factors and one or more balanced scorecard areas)
- Have a positive impact (affects all other performance measures in a positive way)

In the final analysis, it is important to understand that “what gets measured, gets done” so it is essential that we determine the right things to measure.

Key Performance Indicators for agencies such as FC GSD might include measures such as those listed below. However, the determination of these measures should be achieved by following a prescribed process such as Parmenter outlines in *“Key Performance Indicators: Developing, Implementing, and Using Winning KPIs”*.

Customer KPIs:

Work orders completed per complaints received

Percent of work completed on time

Average time to complete work requests

Environment/Community KPIs:

Energy/waste reduction projects completed

Community activities supported

Percent of waste recycled

Employee Satisfaction KPIs:

Absenteeism rate

Staff turnover by type

Number of employees receiving recognition

Financial KPIs:

Projects/work completed within budget

Inventory turnover rate

Total assets (\$)/employee

Internal Process KPIs:

Percent planned maintenance vs. reactive maintenance

Accidents per 100,000 hours worked

“Wrench on bolt” time (productive time) per employee per day

Learning & Growth:

Number of training hours/employee

Number of staff in mentoring programs

Percent of staff cross-trained

Our recommendation is that GSD follow a process such as that outlined by David Parmenter to develop a sound performance measurement program for the Department. GSD has already developed considerable performance measurement structure that is consistent with the discussion above. This suggested exercise would augment the work already accomplished in this area.

SECTION 9: RECOMMENDATIONS

The following high-leverage actions are recommended to enable Fulton County General Services Department to perform at “World Class” service provider levels. It serves as a high-level road map for future customer service, asset management and productivity improvements:

PRACTICE RECOMMENDATIONS

- Short Term (0-9 Mo)
 - SOPs that are results-oriented, not steps-oriented, so that continuous improvement is encouraged
 - Continue the program to make customer feedback a routine, implementing multiple avenues for acquiring feedback data
 - Evaluate the potential for skills training and cross-training along with SOPs to ensure consistent work production and results, include standards for productivity and work quality
 - Continue developing the “balanced scorecard” for FC GSD for each division/section, and

individual staff for managing performance and accountability

- Use Mechanics position as ideal pilot for WFF and Triage to enable subject matter experts more time to focus on “Master Level” work and less time traveling
- Continue implementation of Level of Service and to develop KPIs based on Balanced Scorecard
- Increase awareness of the budget, use regular meetings for budget discussions, train supervisors and higher on the budget process
- Review procurement procedures to ensure the “pendulum swing” is not too far in either direction - must support optimum performance
- Intermediate (9-24 Mo)
 - Conduct resource loading and utilization monitoring to ensure optimum use of resources (people)
 - Develop a plan for each facility as part of a Service Level Agreement (SLA) and share with each FC GSD customer to describe services, operating and capital expenses planned and update the SLA at least once per year
 - Continue to implement the balanced scorecard for agency and staff by incorporating into agency reporting and individual evaluation processes
 - Optimize planned maintenance using Cityworks and Archibus
 - Design skills training and cross-training - include cross-training between trades to achieve optimum flexibility and productivity
 - Consider skill-based compensation to go along with skills training so that flexible, valued workers don't have to wait for vacancies to be compensated for their increased value to the organization
 - Complete development of remaining SOPs (and all policies and procedures)
 - Optimize planned maintenance using Cityworks
 - Help manage reduction in potential OT by using more staggered 10 hour shifts in field
- Long Term (2yr - 5yr)
 - Implement training and cross-training programs in support of improved performance as well as knowledge transfer

- Continue the ongoing regularly-scheduled policy & procedure review program (including SOPs)

TECHNOLOGY RECOMMENDATIONS

- Short Term (0-9 Mo)
 - Develop a Technology Master Plan collaboratively with the Information Technology Department to identify and prioritize improvements
 - Continue to evaluate and determine specific requirements for GPS and mobile data terminals (laptops) in vehicles (already have 31 units in field)
 - Identify functional requirements to fully automate building monitoring and control systems for optimized power consumption
 - Develop a plan to ensure optimum fleet management for long-term maintenance/replacement cost control
- Intermediate (9-24 Mo)
 - Implement GPS and mobile technologies - consider GPS in all vehicles or in primary crew units
 - Detailed design of technology integrations
 - Develop detailed specifications for building automation upgrades (for power consumption optimization)
- Long Term (2yr - 5yr)
 - Implement integration of technologies in accordance to the Technology Master Plan to support best practices (Cityworks, GIS, Financial, etc.)
 - Construct new facilities and building controls to support long-term business model of FC GSD

PEOPLE RECOMMENDATIONS

- Short Term (0-9 Mo)
 - Design cross-training as a strategic tool, develop and train to a skill matrix - link to a skill-based compensation program
 - Perform staff skills assessment and gap analysis

- Implement performance management processes that reward training and knowledge sharing
- Develop a knowledge transfer program including: content experts write SOPs, mentoring, succession planning
- Reorganize around the concept of two Deputy Directors - one for Operations and one for Administrative functions
- Develop a Succession Planning Program including:
 - Conduct cultural assessment and demographic analysis to determine “risk” areas
 - Develop “work catalog” capturing the work, skills, and knowledge requirements of FC GSD and conduct internal HR analysis
 - Identify leadership requirements, skills and knowledge assessment tools
 - Select knowledge management tools
 - Conduct individual assessments and create individual development plans
 - Develop knowledge retention strategy and validate strategies and tools
- Develop a FC GSD-specific Leadership Development Program
- Intermediate (9-24 Mo)
 - Execute succession planning to prevent “brain drain” resulting from retirements
 - Execute Leadership Development program to support succession planning and knowledge retention
 - Implement cross-training program with skills-based compensation to encourage development of a highly productive workforce
- Long Term (2yr - 5yr)
 - Continue implementation of Leadership Development, Cross-training, Succession Planning, and Knowledge Retention initiatives

SECTION 10: CONCLUSIONS

- FC GSD is a strategic partner in the community looking out for its long-term interests.
- FC GSD is a struggling but emerging operation with a 12.4% gap in its core business areas

- The quality of the services provided is not always better than that of contractors.
- Improvements need to focus on results-oriented customer service, asset management, energy savings and personnel development, to name a few
- Implementing the recommendations will take time - 3 to 5 years in most cases.
- One of the highest priorities for FC GSD should be the development of a Succession Plan to ensure sustainability in the coming years as a high percentage of the workforce exits via retirements.

SECTION 11: SUPPLEMENTAL FILES

Slide Presentations from Validation Workshop:

20110811_FC GSD Results Part 1 Intro.pptx

20110811_FC GSD SWOT Results Part 2.pptx

20110811_FC GSD OandM Results Part 3.pptx

20110811_FC GSD Bus Svcs Results Part 4.pptx

20110811_FC GSD Results Part 5 Findings and Recommendations.pptx

Business Model Diagram:

Fulton Co GSD High Level Business Model V2.pdf

Resource Loading Results:

20110705_Fulton County GSD Resource Loading Sheets.xlsx

Workflow Diagrams:

Visio-20110808_Fulton County GSD_Work Order Process.pdf

Visio-20110808_Fulton County GSD_MatI Mgt.pdf