



***Ernst & Young Review of
FY2004 Operating Budget***

Status Report



Context – Review of FY04 Operating Budget

During the late Winter of 2003, the Budget Committee elected to have Ernst & Young, LLC review the proposed FY2004 Operating Budget.

The scope of the review was for the Audit Team to comment on:

- ***Validity and reasonableness of the Operating Proposal***
- ***Opportunities where future actions could deliver cost reductions***

Recommendations

- Near-term focus areas (1-2 year benefit realization):

- ❑ Reduce the controllable absenteeism rate in bus and rail operations.
- ❑ Evaluate the correlation of advertising and marketing expenditure to increase in revenue.
- ❑ Implement an aggressive productivity measurement and activity costing process in the maintenance functions ahead of new systems implementation to highlight areas for continuous improvement.

**Later estimated @
\$2.5M**

**Later identified as Rail
Maintenance @ \$13M**

- Longer-term ideas (3+ year benefit realization, dependent on RenewIT project):

- ❑ Implement a shared service operating model for internal support services to improve service levels and achieve competitive costing.
- ❑ Lower HR cost through self-service approaches with new systems, in particular, benefits administration and computer-based training.
- ❑ Lower finance function costs with more efficient management reporting and analysis using new systems and processes.
- ❑ Transfer inventory ownership to operating groups to encourage reduction of excess inventory and potential write offs.
- ❑ Improve maintenance work planning and scheduling process in conjunction with new systems implementation for improved logistics and utilization of resources.



Management Systems Improvements...

- E&Y noted that efficiencies, economies of scale, and tools to drive productivity were available through new systems technologies, if legacy systems could be replaced

Staff response...

- Most recent Administration Committee session included an in-depth review of Authority-wide progress on this three year-old ITRP initiative
 - BRSD Bus (3rd Qtr Calendar 2005)
 - BRSD Rail (4th Qtr)
 - ABC+ (4th Qtr)
 - HRPR (4th Qtr)
 - MMMS (2nd Qtr Calendar 2006)
 - Customer Relations (2nd Qtr)
 - KRONOS (2nd Qtr)
- All areas suggested for improvement – have or are under-going system upgrades to aid in converting WMATA from a “Build the System” to a “Serve the Customer” business equation
- Beginning in FY05, cost reductions from efficiencies have been incorporated into the Operating Budgets (savings shown on p. 8)



Marketing benefits...

- **E&Y suggested an analysis to correlate advertising and marketing expenditures with increases in revenues**

Staff response...

- **Increased focus on promoting off-peak ridership while reducing ad budget.**
- **WMATA promotional advertising expenditures (FY2005 vs. FY2003):**
 - 28% decrease in WMATA advertising expenses (saving \$0.6M/year).**
 - Within the total, 37% increase in ad expenses to promote off-peak & weekend ridership.**
- **Joint partnerships with 100 partners who promote Metro in their ads.**
- **Off-peak & weekend ridership has increased more than weekday peak ridership (FY2005 vs. FY2003):**
 - 4% increase in weekday peak ridership.**
 - 6% increase in weekday off-peak ridership.**
 - 10% increase in Saturday ridership.**
 - 18% increase in Sunday ridership.**
- **This supports WMATA's business goal to increase off-peak & weekend ridership when there is system capacity.**



Absenteeism savings...

- **E&Y near-term opportunities to reduce the controllable absenteeism rate in bus & rail operations.**

Staff response...

- **Reduction of supervisory overtime: \$1.0M**
- **Implementation of Alternative Discipline Program: \$0.8M**
- **Short term absenteeism: 2% reduction in all Operations offices: \$0.7M**

- **Programs in Operations are enacted to effectively balance financial opportunities with business realities**



Rail maintenance savings...

- **Implement a productivity measurement and activity costing process in the maintenance functions**

Staff response...

- **Staff examined the E&Y preliminary estimate of \$13M potential savings that was based on a small sample study that was then extrapolated upon the total rail maintenance budget. Their estimate was based on 4% expense reduction and was not based on a specific analysis of how/when/where the potential savings could be made.**
- **Staff assessment concurs with the need to define and implement maintenance productivity standards. Our analysis indicates that initial savings in the amount of \$2M can be applied to a portion of the total rail maintenance budget – controlled bench-work. This will be included in our FY2007 budget proposal.**
- **The following tasks are underway and will be completed by the end of the fiscal year for system-wide implementation:**
 - **Review all procedures and practices**
 - **Develop new standards and procedures**
 - **Implement and test new standards**



Almost \$11M in productivity is part of FY07 Operating Proposal...

➤ Systematic improvements implemented due to ITRP

✓ <i>FY05 savings:</i>	<i>\$1.0M</i>	
✓ <i>FY06:</i>	<i>\$1.3M</i>	
✓ <i>FY07: +</i>	<u><i>\$4.1M</i></u>	
<i>Cumulative ITRP savings:</i>		<i>\$6.4M</i>

MORE implementations are coming

➤ Nearer-term opportunities that are delivering returns beyond FY04

✓ <i>Absenteeism – FY05:</i>	<i>\$2.5M</i>	
✓ <i>Rail Maintenance Standards – FY07:</i>	<u><i>\$2.0M</i></u>	
<i>Cumulative near-term project savings:</i>		<u><i>\$4.5M</i></u>

Total Cumulative Savings: *\$10.9M*

Ernst & Young's Final Report

March 27, 2003

WMATA
Cost Management Review
of FY2004 Operating Budget

March 27, 2003

Agenda

- Overview
- Approach
- Analysis & Observations
- Recommendations

Overview

- Ernst & Young was retained to evaluate the FY2004 Budget and management's performance in controlling cost over the period FY2000 to FY2004
- Scope limited to operating expense – capital expense and revenue excluded
- Review included entire organization except Capital Projects Office
- Review process started on January 31, 2003 and ended March 26, 2003

Overall Findings

- *The FY2004 budget cannot be reduced significantly without affecting service level or, potentially, safety and reliability*
- *Board and Management have done a good job managing costs FY2000 to FY2003; however, there are areas of opportunity for WMATA to improve cost performance in the future*

Approach

The approach used consisted of the following activities:

- Establish assumptions - capital budgets, revenue and service levels are fixed
- Develop a process/functional based model of WMATA activities
- Align financial and organizational data with the functional model
- Identify cost trends and drivers
- Review internal performance trends – unit cost, productivity
- Compare cost ratios and practices with similar industries
- Classify cost drivers and analyze controllability
- Evaluate management performance in controlling costs
- Identify areas for savings and improvement

Approach (continued)

Functional Operating Model

Management & Support Services			
<i>Control</i>	<i>Services - internal</i>	<i>Services - external</i>	<i>Security</i>
<ul style="list-style-type: none"> • Exec. Management • Business Planning • Audit 	<ul style="list-style-type: none"> • Finance • Human Resources • Purchasing & Mats. • Info. Technology • Legal 	<ul style="list-style-type: none"> • Customer Service • Communications • Government Relations 	<ul style="list-style-type: none"> • Police • Safety • Casualty/Liability
Core Transit Delivery Services			
<i>Operate</i>	<i>Maintain</i>	<i>Planning & Support</i>	
<ul style="list-style-type: none"> • MetroBus • MetroRail • MetroAccess 	<ul style="list-style-type: none"> • MetroBus • MetroRail • Vertical • Facilities • Systems 	<ul style="list-style-type: none"> • Operations Planning • Technical Support 	

Analysis - Overhead Costs

- Typical Manage-Support to Operating Cost ratio for heavy infrastructure industries is 14-18%
- WMATA's cost ratio (excluding MetroPolice costs) is within the range

Headcount

Manage-Support		17%	
Control	1.4%		
Int. Services	12.6%		
Ext. Services	2.2%		
Security & Safety*	0.9%		
Core		83%	
Operate	38.3%		
Maintain	43.4%		
Plan & Support	1.2%		

Operating Costs

Manage-Support		17%	
Control	1.7%		
Int. Services	11.1%		
Ext. Services	2.0%		
Security & Safety*	2.2%		
Core		83%	
Operate	41.5%		
Maintain	39.9%		
Plan & Support	1.5%		

* excludes MetroPolice for comparison purposes

Analysis - Operating Cost Component Trends

Labor and services are key components of cost increase over the period FY2000 to FY2004:

- Salary expense increased approximately 7.1% annually (inclusive of headcount growth)
- Wage expense increased 4.9% (inclusive of headcount growth)
- Benefits inflation was 7.9% (inclusive of headcount growth)
- Headcount growth was approximately 2.2%
- MetroAccess expenses increased approximately 22% each year
- Contract maintenance, primarily in elevator/escalator, increased 18% annually

	<u>2000</u>	<u>2001</u>	<u>2002</u>	<u>2003E</u>	<u>2004E</u>	<u>'00 - '04</u> <u>Change</u>	<u>% of</u> <u>Change</u>	<u>Average</u> <u>Growth</u>	<u>4- Yr</u> <u>CAGR</u>
Personnel Cost	525.5	564.6	601.2	631.2	663.2	137.7	74%	5.8%	6.0%
Services	47.1	53.1	70.1	79.8	85.1	38.0	20%	15.9%	15.9%
Materials & Supplies	62.5	58.5	61.7	56.0	59.4	-3.1	-2%	-1.5%	-1.3%
Fuel & Propulsion	37.6	41.0	37.1	41.8	44.3	6.7	4%	3.5%	4.2%
Utilities	19.1	21.7	20.2	22.4	23.2	4.1	2%	4.2%	5.0%
Casualty & Liability	7.9	8.8	5.4	3.7	7.7	-0.2	0%	-9.2%	-0.6%
Leases	5.1	3.5	4.4	4.4	4.4	-0.7	0%	-0.7%	-3.6%
Misc & Reimbursements	0.0	2.1	2.3	2.1	1.5	1.5	1%	-11.0%	
less: Prev. Maintenance	-20.6	-19.4	-18.7	-18.5	-18.0	2.6	1%	-3.2%	-3.3%
Total	684.2	733.9	783.7	822.9	870.8	186.6	100%	6.0%	6.2%

Analysis - Fixed Route Cost vs. Total Miles Growth Trend

- From FY2000 to FY2003, the total miles growth rate was higher than the rate of fixed route cost increase
- For FY2004, miles growth rate has slowed and now is being outpaced by the growth rate of fixed route expenses

(all \$ in millions)

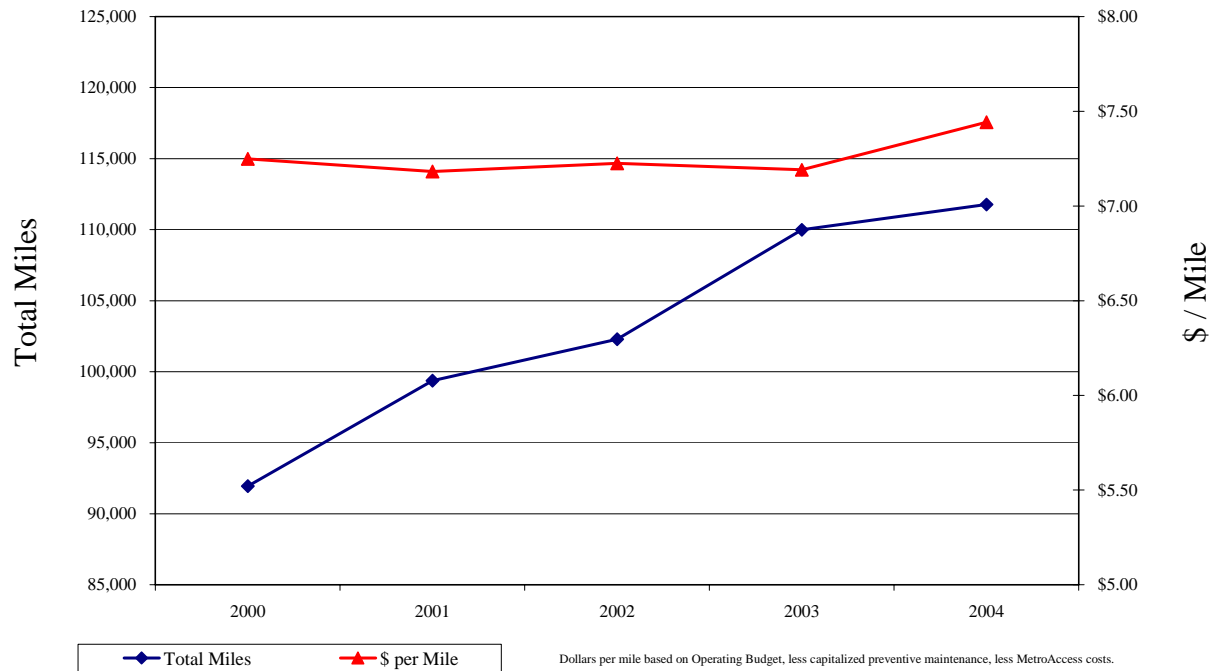
	<u>2000</u>	<u>2001</u>	<u>2002</u>	<u>2003E</u>	<u>2004E</u>	<u>Average Growth %</u>	<u>4-yr CAGR</u>
Total Operating Expense	684.2	733.9	783.7	822.9	870.8	6.0%	6.2%
less MetroAccess	17.7	20.5	26.1	32.5	39.6	22.4%	22.3%
Net Fixed Route Expense	666.5	713.4	757.6	790.4	831.2	<u>5.7%</u>	<u>5.7%</u>
Rail Miles (millions)	49.7	54.8	55.8	62.8	63.0	6.3%	6.1%
Bus Miles (millions)	42.3	44.6	46.5	47.2	48.7	3.6%	3.6%
Total Miles (millions)	92.0	99.4	102.3	110.0	111.8	<u>5.0%</u>	<u>5.0%</u>

Compound Annual Growth
Rate of 6.1%

Compound Annual Growth
Rate of 5.8%

Analysis - Operating Cost per Mile Trend

- Cost management has been good From FY2000 to FY2003, demonstrated by a relatively flat cost per mile trend
- Slowing mileage growth rate in FY2004 and beyond will cause cost per mile to increase
- Significant change in cost structure would be required to keep cost growth in equilibrium with mileage growth
- Change in cost structure implies major changes in work processes and possibly, service level reductions



Analysis - Cost Driver Controllability

- Analysis of total cost increase from FY2000 to FY2004 uses a “fixed cost structure” model
- Model shows that 90% of the cost increase over four years was driven by factors over which management has limited control

Driver	Management Ability to Control			
	Lesser	←	→	Greater
	External Environment and Market	Board Policy	Business Process Investment	Management Discretion
Salary and Wage Inflation	\$62.0M			
Fringe Benefits Inflation	\$35.0M			
Safety & Training Investments			\$25.2M	
Increased Service Level:				
MetroAccess Demand		\$21.3M		
Bus Operation		\$11.9M		
Rail Operation		\$8.2M		
Maintenance Impact		\$12.6M		
Maintenance Productivity Increase			(\$13.7M)	
Aging Vertical Transport Infrastructure		\$6.5M		
Increased Communication to Customers & External Stakeholders				\$6.0M
Increased Security		\$4.7M		
Increased Litigation	\$2.8M			
Increased Revenue Transaction Costs	\$1.6M			
TOTALS:	\$101.4M 55.1%	\$65.2M 35.4%	\$11.5M 6.2%	\$6.0M 3.3%

TOTAL FY2004 Budget	\$888.8M
TOTAL FY2000 Budget	<u>\$704.7M</u>
Difference:	\$184.1M

* Budget amounts exclude the allocation to the capital budget for preventive maintenance in order to ensure consistency.

Analysis - Summary of Functional Reviews

Control

- Operational control and budget control are strong and well integrated into the culture of WMATA.
- Productivity measurement is an area for improvement.
- A strategic plan has been developed and a process is underway to build more detailed business plans, objectives and measures from it.
- A management streamlining process is underway to flatten the organization and increase span of control.

Internal Services

- WMATA's cost ratio for internal support services is in-line with other infrastructure businesses.
- Finance function costs are slightly higher than that of comparable infrastructure industry companies due to lack of systems integration and data management.
- HR function costs are slightly higher than comparable entities due to recent investments in training and other people-related programs. This appears to be justified due to issues with workforce turnover and increasing technological complexity in the transit system.
- IT function spending is extremely low. Lack of investment in business information systems appears to be a constraint to process efficiency improvement in many areas.
- Procurement and materials management expenses are in-line with comparable entities, but inventory management practices do not place enough accountability on operating groups for inventory level growth.

Analysis - Summary of Functional Reviews (continued)

External Services

- Customer service is effective at utilizing technology to improve its service level and reduce cost per customer contact.
- Marketing expenditures have been increasing but no analysis has been done to correlate the impact of these expenses on ridership and revenue.

Security

- MetroPolice force has been expanded in response to heightened security concerns.
- Safety expenditures have increased due to an increased emphasis by the CEO on safety and in response to a significant incident and other findings resulting from an independent review.

Analysis - Summary of Functional Reviews (continued)

Operate

- Bus and rail operations have been increasing in proportion to service level increases.
- Absenteeism shows a slightly increasing trend and may be contributing to an increase in unscheduled overtime.
- MetroAccess expenses are increasing sharply. Service levels provided currently exceed the minimum FTA requirements but management is in the process of analyzing fare and service level changes to manage demand and resulting costs.

Maintain

- Work management practices are inconsistent across different organizations with respect to planning, scheduling and measurement of work output. This is due, in part, to work management system limitations.
- Maintenance focus has generally been on meeting service requirements and maintaining quality. There has been less of a focus on productivity measurement.
- Productivity appears to be increasing in bus, plant and systems maintenance. Railcar productivity appears to be flat, however significant productivity increase is planned with the scheduled fleet increase.

Planning & Support

- The planning and technical support function provides a high amount of value as compared to the relative expenditure level in this area.

Observations

- WMATA effectively controls its costs in the face of a large percentage of increases determined by external factors.
- Support and Core Delivery process cost ratio is balanced and consistent with other infrastructure organizations.
- Management is in the process of three key initiatives which should improve cost management:
 - ❑ management structure streamlining
 - ❑ strategic plan integration with business plan objectives and measures
 - ❑ implementation of modern, integrated resource management systems – RenewIT.
- This review found no opportunities for significant immediate reduction within the FY2004 budget without potential impact to reliability or service level with the exception of Marketing/Advertising spend.
- Opportunities exist for future cost reduction and cost containment. Most of these opportunities involve business process change, some of which are dependent upon the successful completion of the RenewIT project.

Recommendations

- Near-term focus areas (1-2 year benefit realization):
 - ❑ Reduce the controllable absenteeism rate in bus and rail operations.
 - ❑ Evaluate the correlation of advertising and marketing expenditure to increase in revenue.
 - ❑ Implement an aggressive productivity measurement and activity costing process in the maintenance functions ahead of new systems implementation to highlight areas for continuous improvement.
- Longer-term ideas (3+ year benefit realization, dependent on RenewIT project):
 - ❑ Implement a shared service operating model for internal support services to improve service levels and achieve competitive costing.
 - ❑ Lower HR cost through self-service approaches with new systems, in particular, benefits administration and computer-based training.
 - ❑ Lower finance function costs with more efficient management reporting and analysis using new systems and processes.
 - ❑ Transfer inventory ownership to operating groups to encourage reduction of excess inventory and potential write offs.
 - ❑ Improve maintenance work planning and scheduling process in conjunction with new systems implementation for improved logistics and utilization of resources.

Recommendations (continued)

Service level changes were originally not within the scope of this review. However, at the request of the Board, this list of potential service level reductions and associated cost reduction areas was developed. No quantitative analysis on cost reduction has been performed on service level change in these areas.

Service Level Change	Cost Reduction Area
<p><u>Bus Service:</u> Review route performance and eliminate marginal routes Increase route productivity standards Reduce hours of operation Reduce routine bus cleaning and interior maintenance cycles</p>	<p>Reduces operators required; reduces bus mileage which reduces maintenance cost; reduces bus maintenance costs</p>
<p><u>Rail Service:</u> Reduce hours of operation Operate longer trains with increased headway Reduce routine car cleaning and interior maintenance cycles</p>	<p>Reduces operators required and station manager overtime; reduces railcar maintenance costs</p>
<p><u>MetroAccess Service:</u> Set service level at minimum FTA requirements</p>	<p>Reduces growth rate of MetroAccess costs</p>
<p><u>Customer Service:</u> Increase customer call wait times and reduce call center hours</p>	<p>Reduces call center staff</p>
<p><u>Facilities:</u> Reduce routine cleaning/maintenance cycles</p>	<p>Reduces janitorial services cost</p>