Achieving World-Class Performance
Rapid Benchmark Report

Presented to:
State of Ohio

The Hackett Group
February 2008
First and foremost, a sincere thank you to all the dedicated State employees who supported this important project by gathering and supplying the data necessary for this report. The request for their help came during a period of high activity with the deployment of OAKS Human Resources module in January 2007 and the Finance module in July 2007. The request came with little notice and an aggressive timeline, but their dedication and hard work enabled The Hackett Group to create this report which will certainly be key in helping Ohio improve the effectiveness and efficiency of Ohio State government.

What is benchmarking? Benchmarking is one technique for comparing the cost of State operations to other organizations. It is data. It does not tell us what is bad or good; nor is it a plan for improvement. It is directional information to be used in conjunction with other supportive analysis and tools.

Benchmarking is usually done by an outside organization that develops a standardized methodology for collecting and comparing information. The standardization enables a participant to compare its costs to the costs of other organizations doing similar work. By its very nature it is not perfect. No two organizations or States do things in exactly the same way. The Hackett Group was selected to complete Ohio's benchmarking because they have significant experience and available comparative data across each of the four functions Ohio examined (Finance, Information Technology, Procurement and Human Resources).

Each function is compared to a group of relevant organizations which are chosen based on "drivers" such as the number of information technology end users served or the number of employees. The Hackett Group makes every effort to choose organizations of similar size, scope and complexity. The organizations used for comparative purposes are not the same for each function.

Each Sponsor and The Hackett Group felt that most of Ohio's comparison should be against some of the most efficient operations in the world which have been striving and succeeding for several years.
Not every function had other States included in its comparison. In some cases there was insufficient similarity for comparison. In other cases there was insufficient benchmarking information available.

The outcomes of this study will surprise few who are familiar with Ohio operations. Ohio operates on a federated model of government which is costly and relatively inefficient. This report points to many opportunities to improve our “back office” operations. In this time of great need in Ohio, we are committed to gaining efficiency in these fundamental areas.

Governor Strickland has called on all of us in state government to provide public service built on accountability, efficiency, and transparency. Benchmarking is just the first step on a long journey to transformation of state government business operations.

Respectfully Committed to Ohio’s Success,

Hugh Quill, Director  J. Pari Sabety, Director
The Ohio Department of Administrative Services  The Ohio Office of Budget and Management

R. Steve Edmonson, Chief Information Officer
Office of Information Technology
The Department of Administrative Services
# Table of Contents

- **Section One**  
  - Sponsor's Letter

- **Section Two**  
  - Executive Summary

- **Section Three**  
  - Appendix
    - Section One  
      - Introduction
    - Section Two  
      - Financial Rapid Benchmark Report
    - Section Three  
      - Technology Rapid Benchmark Report
    - Section Four  
      - Procurement Rapid Benchmark Report
    - Section Five  
      - Human Resources Rapid Benchmark Report
    - Section Six  
      - Achieving World-Class Performance
    - Section Seven  
      - About The Hackett Group
Executive Summary
Finance

The State’s finance costs as a percent of operating budget are three times those of other states and high performing organizations. We have seventy-five percent more finance staff than other States and one hundred and fifty percent more than high performing organizations. Ohio’s concentration of employees is in processing transactions.

Similar patterns appeared across several finance practices (e.g. accounts payable, travel and expense reimbursement, customer billing). In comparison with high performing organizations these transactions appear to be less automated; what automated applications the State has are less integrated with each other; it takes the State longer to complete transactions; and we have many more corrections.
Information Technology is an area where excellent companies spend MORE money than average companies. They spend more in information technology in order to make other operations in Finance, Human Resources and Procurement more efficient and less costly.

The report indicates that the State has a lot of redundancy in the way information technology (IT) is deployed across the State. The State has many locations, many suppliers, many database platforms, and many programming languages. The report indicates underutilization of program management offices and standard methods to manage IT projects.

Further, the report reveals a relatively high investment in IT infrastructure and a correspondingly underinvestment in applications. Finally, the State has more people at lower cost than high performing comparators which probably contributes to three times more turnover in IT staff. The State also seems to have narrower spans of control than high performing organizations.
Executive Summary
Procurement

The State’s procurement costs as a percent of procurement spend is three times that of high performing organizations; the State has five times the number of procurement staff and nearly 1.7 time the number of supplies as high performing organizations.

Purchase order processing is nearly ten times as costly for the State as in high performing companies; receipt processing is over 13 times as costly. The best performing companies have 80-90% of most of their procurement transactions automated; the State has 20-30% of most of its transactions automated.

The State has many more suppliers than high performing companies. The State has five times more staff in sourcing execution and is rarely measuring total cost of ownership and acquisition while virtually all high performing organizations always measure it.
Ohio has more of its human resource staff focused on transactions than high performing companies. The State’s human resource transactions are between 2 and 10 times as costly. The State’s transactions have a low level automation and a higher error rate than high performing companies.

The State has high costs and more employees in staffing workforce development and labor relations and lower costs and fewer employees in organization effectiveness. The State’s new hire activities are less automated and days to fill open positions is twice as long as high performing companies.
Table of Contents

Section One
– Sponsor's Letter

Section Two
– Executive Summary

Section Three
– Appendix

Section One
– Introduction

Section Two
– Financial Rapid Benchmark Report

Section Three
– Technology Rapid Benchmark Report

Section Four
– Procurement Rapid Benchmark Report

Section Five
– Human Resources Rapid Benchmark Report

Section Six
– Achieving World-Class Performance

Section Seven
– About The Hackett Group
The Information Technology Benchmark Scope

- Benchmark covered State of Ohio’s investment across Hackett defined processes
  - Information Technology 11 processes
  - Finance 8 processes
  - Human Resources 11 processes
  - Procurement 11 process
- Information was collected globally
  - FTE data and best practice questions were collected across the various agencies within the State of Ohio
- The benchmark period for which costs, full-time equivalents ("FTEs"), practice related and volume data were collected was July 2006 – June 2007.
The Hackett Group Compared Your Organization to Comparable Orgs and World-Class for Several Key Hackett Metrics

- **Comparable Org Median** - this comparison is against your organization’s comparable organization group of Large Diverse (IT, HR) or Consolidated (FIN) or High Complexity (PROC) organizations.

- **World-Class** - this represents the median of the World-Class companies in the Hackett database (World-Class was determined based on first quartile performance in both efficiency and effectiveness).

- **Normalization of benchmark data**: Comparable Orgs & World-Class data is adjusted to “drivers” at your organization.

  End Users = 70,554 (IT)  Employees = 53,751 (HR)

- **Effectiveness and efficiency scores** are mapped to Hackett Value Grids

- **1st Quartile** represents a specific organization at the 25th percentile.
Benchmark Results Should be Evaluated in Conjunction With the Specific Requirements of Your State’s Operations

<table>
<thead>
<tr>
<th>What this benchmark is . . .</th>
<th>What this benchmark is not . . .</th>
</tr>
</thead>
<tbody>
<tr>
<td>A starting point</td>
<td>Not the end answer</td>
</tr>
<tr>
<td>Tells us where to focus</td>
<td>Not a detailed analysis of how to redesign our processes</td>
</tr>
<tr>
<td>Process based comparison . .</td>
<td>Not an exact match to our departments . .</td>
</tr>
<tr>
<td>. . . data was scrubbed internally and externally by Hackett</td>
<td>no benchmarking is</td>
</tr>
<tr>
<td>One input to setting targets</td>
<td>Not the only input</td>
</tr>
<tr>
<td>A broad look at Finance, Procurement and HR</td>
<td>Does not cover all aspects of your operations</td>
</tr>
</tbody>
</table>
Defining Costs

- **Labor Cost**: Labor cost is the cost of providing compensation for full time and part time employees based on a normal work week. Labor cost includes the following: Salaries & wages; Overtime/vacation/sick pay/personal leave; Bonuses/Social Security/Medicare/health; Pension/retirement/savings/401k plans; Bonus plans.
  - Fully-loaded labor costs are annualized and do not include stock options, one-time severance pay due to restructuring, or signing bonuses.

- **Outsourcing Cost**: Outsourcing Costs are external costs associated with the delivery of the process or service. Outsourcing costs are typically fees paid to 3rd party firms to manage a process or activity. Examples include strategic consulting, process level consulting, manual data entry, or other activities in which your organization receives support within a process but has limited to no visibility into the supporting tools utilized by the third party or the number of staff involved.

- **Technology**: Technology costs include the cost of providing computer processing software, hardware and Management Information Services (MIS) to the organization for the given processes. Technology costs also include all labor related charges associated with the development and ongoing support of systems and software applications for this function.

- **Other Cost**: Other costs are the non-labor costs normally required to support the in scope staff and its operations. Other cost includes: facilities and overhead costs (e.g., rent, building depreciation, utilities, etc.); Typically allocated by head count or by square footage); travel and travel-related expenses; annual training cost for the in scope staff; other cost (e.g., supplies, magazines, memberships, postage, etc.) for the in scope staff.
Defining Staffing (FTEs) and Staff Mix

**FTE:** A full time equivalent ("FTE") is based on a regular work week, typically 40 hours. An employee that works 20 hours a week would be a .5 FTE. However, anyone working more than 40 hours is still just one FTE. Overtime hours are excluded. FTEs can only be captured in increments of 10%. Include independent contractors in the determination of headcount (and fully loaded labor cost) if they are actively managed (i.e., defined work hours or productivity levels).

**Manager:** Managers are persons primarily responsible for leading a department (or a number of departments) and performing oversight, planning, administrative and personnel functions. A manager is any person that directly supervises staff. Exclude those employees that may have a manager title but do not have any staff reporting to them or performance management responsibility for another employee.

**Professional:** Professionals are persons primarily performing analytical and technical functions. They work in highly-skilled positions, are normally considered professionals, and are typically exempt from overtime. Professionals are typically degreed and may hold certifications. Persons holding a managerial title but having no supporting staff should be considered as professional.

**Clerical:** Clericals are persons primarily performing routine data entry, filing, typing and other related administrative tasks. These persons typically work in hourly positions that are normally eligible for overtime.
Table of Contents

- Section One
  - Sponsor's Letter

- Section Two
  - Executive Summary

- Section Three
  - Appendix
    - Section One
      - Introduction
    - Section Two
      - Financial Rapid Benchmark Report
    - Section Three
      - Technology Rapid Benchmark Report
    - Section Four
      - Procurement Rapid Benchmark Report
    - Section Five
      - Human Resources Rapid Benchmark Report
    - Section Six
      - Achieving World-Class Performance
    - Section Seven
      - About The Hackett Group

The Hackett Group
February 13, 2008
Efficiency and Effectiveness Ranking as Calculated by The Hackett Group’s Finance Value Grid

- Finance costs for the in scope processes were $210.09 million
  - Total Finance cost of $210.09m equates to 1.85% of operating budget (4th quartile)
  - Higher staffing levels and outsourcing costs
  - 75% focus on Transactional processing
  - Even staff mix between Clerical, Professional and Managerial

- FN scores fourth quartile on the Hackett Value Grid for efficiency
  - Low efficiency plotting on the value grid due to high total and transaction processing costs, higher FTEs and cycle times and minimal technology leverage and lower productivity

- FN scores third quartile on the Hackett Value Grid for effectiveness:
  - Low effectiveness plotting attributed to Finance role, talent management, lower value of analysis, quality, economic return and information access
Finance Demographics Comparison – Ohio and the Large Consolidated Organization Slice of the Hackett Database

Operating budget

- $1B
- $2B
- $6B
- $13B

Employees

- 3K
- 7K
- 15K
- 40K

Countries

- 1
- 5
- 20
- 40

Operating locations

- 20
- 50
- 100
- 250

Product lines

- 0
- 5
- 10
- 20
- 50

State of Ohio

Comparable Org Group Median

World-Class range
Finance Participants in the Large Consolidated Organization Slice of the Hackett Database

- AAFES - Army and Air Force Exchange Service
- Advanced Micro Devices Inc.
- Ameren Corporation
- Arrow Electronics
- Basell Polyolefins
- BJ’s Wholesale Club, Inc.
- Capital One Financial Corporation
- Centrica plc
- Citgo
- CMS Energy Corporation
- Commonwealth of Massachusetts
- Constellation Energy
- Comings, Inc.
- Corporate Express
- Countrywide Financial Corporation
- Daimler Chrysler Corporation
- Department of Commerce
- Eastman Chemical Company
- EMC Corporation
- Freightliner Group
- GMAC
- HCR-Manor Care
- Highmark
- Hormel Foods
- Interbrew
- International Truck and Engine Corporation
- Irving Oil Limited
- Johnson Controls, Inc.
- Land O’Lakes
- Liz Claiborne, Inc.
- NASACT – State of Arizona
- NASACT – State of Colorado
- NASACT – State of Delaware
- NASACT – State of Georgia
- NASACT – State of Tennessee
- NASACT – State of Mississippi
- NASACT – Commonwealth of Massachusetts
- Newmont Mining Corporation
- Nextel Communications, Inc.
- NiSource, Inc.
- Nissan Motor Corporation
- Northwest Airlines
- Ontario Power Generation
- Oracle Corporation
- Panasonic
- Philip Morris USA Inc.
- PPG Industries, Inc.
- PSEG Corporation
- Radio Shack
- Renault SA
- Royal Caribbean Cruises, Ltd.
- Saudi Aramco
- The TJX Companies, Inc.
- TIAA-CREF
- UAL Corporation
- Unisource Worldwide, Inc.
- United Space Alliance
- Visteon Corporation
- We Energies
- Williams Company
### Data was Collected in Accordance with Hackett’s Finance Taxonomy

<table>
<thead>
<tr>
<th>Transactional</th>
<th>Control and Risk Management</th>
<th>Planning and Strategy</th>
<th>Management and Administration</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Cash Disbursements</strong></td>
<td><strong>Treasury Management</strong></td>
<td><strong>Planning and Performance Management</strong></td>
<td><strong>Function Management</strong></td>
</tr>
<tr>
<td>– Accounts Payable</td>
<td>– Cash Management</td>
<td>– Business Analysis</td>
<td></td>
</tr>
<tr>
<td>– Travel and Expense</td>
<td>– Capital and Risk Management</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Revenue Cycle</strong></td>
<td><strong>Compliance Management</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>– Credit</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>– Customer Billing</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>– Collections</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>– Cash Application</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Accounting and External Reporting</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>– Fixed Assets</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>– Inter-Agency Accounting</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>– General Ledger Accounting</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>– Cost Accounting</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>– External Reporting</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
State of Ohio’s Baseline of Annual Finance Cost *

- **Total cost excludes Other Non-labor Process Cost for comparability to benchmark database.**

Operating Budget = $11.35 Billion

- **Other cost – $13.39 Million**
  - Facilities & Overhead
  - Travel
  - Training
  - Other (Supplies, subscriptions, etc.)

- **Technology cost – $13.33 Million**
  - Computer processing
  - Maintenance

- **Outsourcing cost – $83.88 Million**
  - Outside services

- **Labor cost – $99.49 Million**
  - Wages (full-time and part-time)
  - Overtime and bonuses
  - Taxes and fringe benefits

Process Cost: $183.37 Million

- **$210.09 Million**
  - $99.49 Million
  - $83.88 Million
  - $13.39 Million
  - $13.33 Million

- **$11.35 Billion**
State of Ohio’s Volumes Related to the Large Consolidated Organizations

Finance Transaction Volumes

- Customer Invoices: 4,586,522 (State of Ohio: 645,851)
- Customer Remittances: 2,746,925 (State of Ohio: 449,993)
- Customers: 12,000,000 (State of Ohio: 384,243)
- Supplier Invoices: 3,151,567 (State of Ohio: 980,114)
State of Ohio’s Baseline Resource Allocation and Staff Mix

Resource Allocation

- Transaction Processing: 75%
- Control and Risk Management: 11%
- Planning and Strategy: 9%
- Mgmt and Administration: 5%

Staff Mix

- Manager: 39%
- Professional: 33%
- Clerical: 28%
State of Ohio’s Value Grid Shows Opportunity to Improve Performance in Effectiveness and in Efficiency

<table>
<thead>
<tr>
<th>Key Finance Drivers</th>
<th>State of Ohio</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total Cost</td>
<td><strong>Low</strong></td>
</tr>
<tr>
<td>Transaction Processing Cost</td>
<td><strong>Low</strong></td>
</tr>
<tr>
<td>FTEs &amp; Productivity</td>
<td><strong>Low</strong></td>
</tr>
<tr>
<td>Cycle Time</td>
<td><strong>Low</strong></td>
</tr>
<tr>
<td>Technology Leverage</td>
<td><strong>Low</strong></td>
</tr>
<tr>
<td>Role of Finance</td>
<td><strong>Near World-Class</strong></td>
</tr>
<tr>
<td>Talent Management</td>
<td><strong>Near World-Class</strong></td>
</tr>
<tr>
<td>Value of Analysis</td>
<td><strong>Near World-Class</strong></td>
</tr>
<tr>
<td>Quality</td>
<td><strong>Near World-Class</strong></td>
</tr>
<tr>
<td>Economic Return</td>
<td><strong>Near World-Class</strong></td>
</tr>
<tr>
<td>Information Access</td>
<td><strong>Near World-Class</strong></td>
</tr>
</tbody>
</table>

- **Low**: Most KPIs for the Key Driver are at or near World-Class
- **Near World-Class**: Some KPIs for the Key Driver are at or near World-Class
- **Far from World-Class**: Most KPIs for the Key Driver are far from World-Class

The graph shows the comparison of Effectiveness and Efficiency of Comparable Orgs and State of Ohio.
State of Ohio’s Finance Costs are Driven by Staffing and Outsourcing

$210.09 Million

Operating Budget $11.35 billion
Labor $99.49 million
Outsourcing $83.88 million
Technology $13.33 million
Other $13.39 million

FTE Allocation

Finance Cost as a % of Operating Budget

Transaction Processing
Planning & Strategy
Mgt & Admin
Control & Risk Mgt

State of Ohio
NASACT Median
Comparable Orgs
World-Class

Total cost excludes Other Non-labor Process Cost for comparability to benchmark database.
Higher Investment in Technology has not Reduced Overall Staffing

**Technology Cost as a % of Operating Budget**

<table>
<thead>
<tr>
<th>Allocation</th>
<th>State of OH</th>
<th>NASACT Median</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Transactional</td>
<td>75%</td>
<td>75%</td>
<td>61%</td>
<td>53%</td>
</tr>
<tr>
<td>Control and Risk Management</td>
<td>9%</td>
<td>9%</td>
<td>11%</td>
<td>12%</td>
</tr>
<tr>
<td>Planning &amp; Strategy</td>
<td>11%</td>
<td>12%</td>
<td>20%</td>
<td>26%</td>
</tr>
<tr>
<td>Mgt &amp; Admin</td>
<td>5%</td>
<td>4%</td>
<td>7%</td>
<td>9%</td>
</tr>
</tbody>
</table>

**Finance Staffing (FTEs)**

Comparative Org Group and World-Class Normalized based on Operating Budget

- **State of Ohio**: 1,375.70
  - Technology: 65.2
  - Control and Risk Management: 150.8
  - Planning and Strategy: 130.4

- **NASACT Median**: 1,029.3
  - Technology: 69.7
  - Control and Risk Management: 124.5
  - Planning and Strategy: 94.7

- **Comparable Orgs**: 799.4
  - Technology: 48.4
  - Control and Risk Management: 69.7
  - Planning and Strategy: 35.3

- **World-Class**: 555.1
  - Technology: 48.4
  - Control and Risk Management: 69.0
  - Planning and Strategy: 43.4
  - Management and Administration: 143.7

*The Hackett Group*

February 13, 2008
## Finance Cost Differences to Comparable Organizations and to World-Class

### Finance Cost Differences (in $)

<table>
<thead>
<tr>
<th>Finance Processes</th>
<th>State of Ohio’s Costs (in Millions)</th>
<th>State of Ohio’s Gap to Comparable Orgs (in Millions)</th>
<th>State of Ohio’s Gap to World-Class (in Millions)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cash Disbursements</td>
<td>62.7</td>
<td>57.0</td>
<td>57.3</td>
</tr>
<tr>
<td>Revenue Cycle</td>
<td>62.9</td>
<td>57.2</td>
<td>58.2</td>
</tr>
<tr>
<td>General Accounting and External Reporting</td>
<td>14.6</td>
<td>3.3</td>
<td>4.8</td>
</tr>
<tr>
<td>Treasury Management</td>
<td>12.9</td>
<td>10.6</td>
<td>10.7</td>
</tr>
<tr>
<td>Compliance Management</td>
<td>9.7</td>
<td>1.7</td>
<td>2.2</td>
</tr>
<tr>
<td>Planning and Performance Management</td>
<td>8.9</td>
<td>1.0</td>
<td>(0.8)</td>
</tr>
<tr>
<td>Business Analysis</td>
<td>5.9</td>
<td>0.2</td>
<td>(0.2)</td>
</tr>
<tr>
<td>Management and Administration</td>
<td>5.9</td>
<td>0.7</td>
<td>0.5</td>
</tr>
<tr>
<td>Total Process Costs</td>
<td>183.4</td>
<td>131.7</td>
<td>132.7</td>
</tr>
<tr>
<td>Technology Cost</td>
<td>13.3</td>
<td>3.1</td>
<td>4.0</td>
</tr>
<tr>
<td>Other Cost</td>
<td>13.4</td>
<td>4.3</td>
<td>7.1</td>
</tr>
<tr>
<td>Total Finance Cost</td>
<td>210.1</td>
<td>139.1</td>
<td>143.8</td>
</tr>
</tbody>
</table>

**Cost Differences:** The cost differences shown are mathematical calculations intended to give an understanding of processes with potential for performance improvement. Areas of focus and actual performance improvement targets should be developed only after considering issues such as organizational structure, business requirements, regulatory requirements, investments required and other factors.
## Cash Disbursement Practices

<table>
<thead>
<tr>
<th>Accounts Payable Best Practices</th>
<th>State of Ohio</th>
<th>Top Performers</th>
</tr>
</thead>
<tbody>
<tr>
<td>Integration of AP applications with Purchasing applications</td>
<td>48%</td>
<td>100%</td>
</tr>
<tr>
<td>Integration of AP applications with GL applications</td>
<td>50%</td>
<td>100%</td>
</tr>
<tr>
<td>Percent supplier/vendor transactions automated</td>
<td>12%</td>
<td>68%</td>
</tr>
<tr>
<td>Days to process an invoice once received in AP</td>
<td>9</td>
<td>2</td>
</tr>
<tr>
<td>Suppliers submitting invoices electronically</td>
<td>10%</td>
<td>25%</td>
</tr>
<tr>
<td>Suppliers using self-service over the Internet</td>
<td>3%</td>
<td>8%</td>
</tr>
<tr>
<td>Percent A/P invoices require correction</td>
<td>4%</td>
<td>1%</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Travel &amp; Expense Best Practices</th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Travelers complete and submitting expense report online</td>
<td>31%</td>
<td>100%</td>
</tr>
<tr>
<td>Percent T&amp;E transactions automated</td>
<td>25%</td>
<td>Na</td>
</tr>
<tr>
<td>Extent payment is made directly to the travel card provider</td>
<td>18%</td>
<td>Low sample size</td>
</tr>
<tr>
<td>Expense reports requiring correction</td>
<td>13%</td>
<td>1%</td>
</tr>
<tr>
<td>Travel expense report sampled for compliance</td>
<td>86%</td>
<td>48%</td>
</tr>
</tbody>
</table>

*na = New Question/Small Sample Size

Total Process Cost: $62.7 million

Total FTEs: 616.16

Cost per AP invoice: $29.06

AP invoice per FTE: 5,582

Cost per T&E transaction: $37.32

T&E reports per FTE: 4,435
## Revenue Cycle

<table>
<thead>
<tr>
<th>Customer Billing Practices</th>
<th>State of Ohio</th>
<th>Top Performers</th>
</tr>
</thead>
<tbody>
<tr>
<td>Percent billing transactions automated</td>
<td>22%</td>
<td>98%</td>
</tr>
<tr>
<td>Billing cycle time</td>
<td>16</td>
<td>Na</td>
</tr>
<tr>
<td>Occurrence of billing errors</td>
<td>3%</td>
<td>1%</td>
</tr>
<tr>
<td>Billing application integration to sales/order entry</td>
<td>20%</td>
<td>100%</td>
</tr>
<tr>
<td>Billing application integration to AR</td>
<td>33%</td>
<td>100%</td>
</tr>
<tr>
<td>Billing system enables consolidated invoicing for multiple items</td>
<td>23%</td>
<td>Na</td>
</tr>
<tr>
<td>Invoices are sent to customers electronically</td>
<td>4%</td>
<td>41%</td>
</tr>
<tr>
<td>Customer self-service for problem resolution and inquiries</td>
<td>14%</td>
<td>100%</td>
</tr>
<tr>
<td>Percent cash application transactions automated</td>
<td>29%</td>
<td>97%</td>
</tr>
<tr>
<td>Average time to apply cash (days)</td>
<td>3</td>
<td>1</td>
</tr>
</tbody>
</table>

*na = New Question/Small Sample Size

**Total Process Cost:** $62.9 million

**Total FTEs:** 220.2

**Cost per billing transaction:** $2.11

**Bills per FTE:** 69,304

**Cost per remittance:** $11.24

**Remittances per FTE:** 28,749
Finance Staffing and Resource Allocation

Finance Staffing (FTEs)
Comparable Org Group and World-Class Normalized based on Operating Budget

<table>
<thead>
<tr>
<th>State of Ohio</th>
<th>1,375.70</th>
</tr>
</thead>
<tbody>
<tr>
<td>65.2</td>
<td></td>
</tr>
<tr>
<td>150.8</td>
<td></td>
</tr>
<tr>
<td>130.4</td>
<td></td>
</tr>
<tr>
<td>598.3</td>
<td></td>
</tr>
<tr>
<td>35.3</td>
<td></td>
</tr>
<tr>
<td>1,029.3</td>
<td></td>
</tr>
<tr>
<td>377.0</td>
<td></td>
</tr>
<tr>
<td>150.8</td>
<td></td>
</tr>
<tr>
<td>94.7</td>
<td></td>
</tr>
<tr>
<td>94.7</td>
<td></td>
</tr>
<tr>
<td>1,029.3</td>
<td></td>
</tr>
<tr>
<td>377.0</td>
<td></td>
</tr>
<tr>
<td>150.8</td>
<td></td>
</tr>
<tr>
<td>94.7</td>
<td></td>
</tr>
<tr>
<td>94.7</td>
<td></td>
</tr>
<tr>
<td>1,029.3</td>
<td></td>
</tr>
<tr>
<td>377.0</td>
<td></td>
</tr>
<tr>
<td>150.8</td>
<td></td>
</tr>
<tr>
<td>94.7</td>
<td></td>
</tr>
<tr>
<td>94.7</td>
<td></td>
</tr>
</tbody>
</table>

Finance Resource Allocation

| World-Class | 53% | 12% | 26% | 9% |
| Comparable Orgs | 61% | 11% | 20% | 7% |
| NASACT Median | 75% | 9% | 12% |
| State of Ohio | 75% | 9% | 11% |

Legend:
- **Yellow**: Transaction Processing
- **Green**: Control and Risk Management
- **Blue**: Planning and Strategy
- **Orange**: Management and Administration

The Hackett Group
February 13, 2008
Staff Mix, Labor Rates and Spans of Control

Staff Mix

- World-Class: 23% Manager, 42% Professional, 35% Clerical
- Comparable Orgs: 21% Manager, 42% Professional, 37% Clerical
- NASACT Median: 21% Manager, 41% Professional, 38% Clerical
- State of Ohio: 28% Manager, 33% Professional, 39% Clerical

Average Fully Loaded Labor Cost ($ per FTE)

- State of Ohio: 72,318
- NASACT Median: 61,772
- Comparable Orgs: 77,069
- World-Class: 86,563

Number of Staff to Managers (Span of Control)

- State of Ohio: 2.58
- NASACT Median: 3.71
- Comparable Orgs: 3.76
- World-Class: 3.34
Formal Business Experience and Turnover of the Finance Staff

### Advanced Business Degrees

<table>
<thead>
<tr>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>29%</td>
<td>59%</td>
<td>75%</td>
</tr>
</tbody>
</table>

### Turnover

<table>
<thead>
<tr>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>5%</td>
<td>8%</td>
<td>7%</td>
</tr>
</tbody>
</table>
### Technology Cost as a Percent of Operating Budget and Cost per Finance FTE

<table>
<thead>
<tr>
<th>Comments</th>
</tr>
</thead>
<tbody>
<tr>
<td>▪ Technology: Top performing companies typically have higher technology cost as a % of Operating Budget and higher technology cost per FTE, with lower actual FTE counts particularly in the transactional processes.</td>
</tr>
<tr>
<td>▪ Technology costs include hardware, software, depreciation, networking, telecommunications and support costs related to the in scope Finance processes.</td>
</tr>
<tr>
<td>▪ Technology Cost will vary based upon the age of the applications and the stage of the investment cycle.</td>
</tr>
</tbody>
</table>

#### Technology Cost as a % of Operating Budget

<table>
<thead>
<tr>
<th>State of Ohio</th>
<th>NASACT Median</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>0.12%</td>
<td>0.08%</td>
<td>0.09%</td>
<td>0.08%</td>
</tr>
</tbody>
</table>

#### Technology Cost ($) per FTE

<table>
<thead>
<tr>
<th>State of Ohio</th>
<th>NASACT Median</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>9,687</td>
<td>12,042</td>
<td>16,911</td>
<td>16,733</td>
</tr>
</tbody>
</table>
## Finance Cost Differences to Comparable Orgs and to World-Class

### Finance Cost Differences (in $)

<table>
<thead>
<tr>
<th>Finance Processes</th>
<th>State of Ohio’s Costs (in Millions)</th>
<th>State of Ohio’s Gap To Comparable Orgs (in Millions)</th>
<th>State of Ohio’s Gap to World-Class (in Millions)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cash Disbursements</td>
<td>62.7</td>
<td>57.0</td>
<td>57.3</td>
</tr>
<tr>
<td>Revenue Cycle</td>
<td>62.9</td>
<td>57.2</td>
<td>58.2</td>
</tr>
<tr>
<td>General Accounting and External Reporting</td>
<td>14.6</td>
<td>3.3</td>
<td>4.8</td>
</tr>
<tr>
<td>Treasury Management</td>
<td>12.9</td>
<td>10.6</td>
<td>10.7</td>
</tr>
<tr>
<td>Compliance Management</td>
<td>9.7</td>
<td>1.7</td>
<td>2.2</td>
</tr>
<tr>
<td>Planning and Performance Management</td>
<td>8.9</td>
<td>1.0</td>
<td>(0.8)</td>
</tr>
<tr>
<td>Business Analysis</td>
<td>5.9</td>
<td>0.2</td>
<td>(0.2)</td>
</tr>
<tr>
<td>Management and Administration</td>
<td>5.9</td>
<td>0.7</td>
<td>0.5</td>
</tr>
<tr>
<td>Total Process Costs</td>
<td>183.4</td>
<td>131.7</td>
<td>132.7</td>
</tr>
<tr>
<td>Technology Cost</td>
<td>13.3</td>
<td>3.1</td>
<td>4.0</td>
</tr>
<tr>
<td>Other Cost</td>
<td>13.4</td>
<td>4.3</td>
<td>7.1</td>
</tr>
<tr>
<td>Total Finance Cost</td>
<td>210.1</td>
<td>139.1</td>
<td>143.8</td>
</tr>
</tbody>
</table>

**Cost Differences:** The cost differences shown are mathematical calculations intended to give an understanding of processes with potential for performance improvement. Areas of focus and actual performance improvement targets should be developed only after considering issues such as organizational structure, business requirements, regulatory requirements, investments required and other factors.
Transaction Processing Costs and Staffing Levels

Process Cost as a % of Operating Budget

<table>
<thead>
<tr>
<th>Category</th>
<th>State of Ohio</th>
<th>NASACT Median</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cash Disbursements</td>
<td>0.55%</td>
<td>0.15%</td>
<td>0.10%</td>
<td>0.05%</td>
</tr>
<tr>
<td>Revenue Cycle</td>
<td>0.55%</td>
<td>0.10%</td>
<td>0.05%</td>
<td>0.04%</td>
</tr>
<tr>
<td>General Accounting and External Reporting</td>
<td>0.13%</td>
<td>0.09%</td>
<td>0.10%</td>
<td>0.09%</td>
</tr>
</tbody>
</table>

Transaction Processing FTEs

<table>
<thead>
<tr>
<th>Category</th>
<th>State of Ohio</th>
<th>NASACT Median</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cash Disbursements</td>
<td>244.4</td>
<td>99.1</td>
<td>88.8</td>
<td>64.6</td>
</tr>
<tr>
<td>Revenue Cycle</td>
<td>220.2</td>
<td>191.3</td>
<td>131.4</td>
<td>64.6</td>
</tr>
<tr>
<td>General Accounting and External Reporting</td>
<td>192.3</td>
<td>162.6</td>
<td>146.5</td>
<td>140.6</td>
</tr>
</tbody>
</table>
### Accounts Payable Practices

#### A/P Cost ($) per Invoice

- **State of Ohio**: 29.03
- **Comparable Orgs**: 3.58

#### A/P Invoices per FTE

- **State of Ohio**: 5,582
- **Comparable Orgs**: 15,693

<table>
<thead>
<tr>
<th>Accounts Payable Best Practices</th>
<th>State of Ohio</th>
<th>Top Performers</th>
</tr>
</thead>
<tbody>
<tr>
<td>Integration of accounts payable applications with purchasing applications</td>
<td>48%</td>
<td>100%</td>
</tr>
<tr>
<td>Integration of accounts payable applications with general ledger applications</td>
<td>50%</td>
<td>100%</td>
</tr>
<tr>
<td>Extent policies and procedures for accounts payable are standardized across business units</td>
<td>0%</td>
<td>na</td>
</tr>
<tr>
<td>Percent supplier/vendor transactions automated</td>
<td>12%</td>
<td>68%</td>
</tr>
<tr>
<td>Days to process an invoice once received in accounts payable</td>
<td>9</td>
<td>2</td>
</tr>
<tr>
<td>Suppliers submitting invoices electronically (based on volume)</td>
<td>10%</td>
<td>25%</td>
</tr>
<tr>
<td>Suppliers using self-service over the Internet (based on volume)</td>
<td>3%</td>
<td>8%</td>
</tr>
<tr>
<td>Percent A/P invoices require correction</td>
<td>4%</td>
<td>1%</td>
</tr>
<tr>
<td>Average days payables outstanding (DPO)</td>
<td>14.7</td>
<td>na</td>
</tr>
<tr>
<td>Percent invoice transactions are self-billed (Evaluated Receipt Settlement = ERS)</td>
<td>1%</td>
<td>na</td>
</tr>
</tbody>
</table>

*na = New Question/Small Sample Size
Travel & Expense Practices

Travel & Expense Cost ($) per Transaction

37.32

Travel & Expense Reports per FTE

7,413

Travel and Expense Best Practices

<table>
<thead>
<tr>
<th>Travel and Expense Best Practices</th>
<th>State of Ohio</th>
<th>Top Performers</th>
</tr>
</thead>
<tbody>
<tr>
<td>Percent T&amp;E transactions automated</td>
<td>25%</td>
<td>na</td>
</tr>
<tr>
<td>Extent policies and procedures for travel and expenses standardized</td>
<td>95%</td>
<td>na</td>
</tr>
<tr>
<td>across business units</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Travelers complete and submitting expense reports online</td>
<td>31%</td>
<td>100%</td>
</tr>
<tr>
<td>Expense reports requiring correction</td>
<td>13%</td>
<td>1%</td>
</tr>
<tr>
<td>Extent payment is made directly to the travel card provider</td>
<td>18%</td>
<td>low sample size</td>
</tr>
<tr>
<td>Travel expense reports sampled for compliance</td>
<td>86%</td>
<td>48%</td>
</tr>
</tbody>
</table>
Customer Billing Practices

Customer Billing Cost ($) per Transaction

<table>
<thead>
<tr>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
</tr>
</thead>
<tbody>
<tr>
<td>2.11</td>
<td>1.07</td>
</tr>
</tbody>
</table>

Customer Bills per FTE

<table>
<thead>
<tr>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
</tr>
</thead>
<tbody>
<tr>
<td>69,304</td>
<td>70,570</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Customer Billing Best Practices</th>
<th>State of Ohio</th>
<th>Top Performers</th>
</tr>
</thead>
<tbody>
<tr>
<td>Percent billing transactions automated</td>
<td>22%</td>
<td>98%</td>
</tr>
<tr>
<td>Billing cycle time</td>
<td>16</td>
<td>na</td>
</tr>
<tr>
<td>Occurrence of billing errors</td>
<td>3%</td>
<td>1%</td>
</tr>
<tr>
<td>Billing application integration to sales/order entry</td>
<td>20%</td>
<td>100%</td>
</tr>
<tr>
<td>Billing application integration to accounts receivable</td>
<td>33%</td>
<td>100%</td>
</tr>
<tr>
<td>Billing system enables consolidated invoicing for multiple items</td>
<td>23%</td>
<td>na</td>
</tr>
<tr>
<td>Invoices are sent to customers electronically</td>
<td>4%</td>
<td>41%</td>
</tr>
<tr>
<td>Customer self-service for problem resolution and inquiries</td>
<td>14%</td>
<td>100%</td>
</tr>
<tr>
<td>Customer billing policy/ procedure standardization (Finance Fin)</td>
<td>50%</td>
<td>na</td>
</tr>
<tr>
<td>Utilization of electronic bill payment and presentment</td>
<td>10%</td>
<td>na</td>
</tr>
<tr>
<td>Utilization of standardized pricing, including discounting, rebates and mark-ups</td>
<td>38%</td>
<td>na</td>
</tr>
</tbody>
</table>

*na = New Question/Small Sample Size
### Cash Application Practices

#### Cash Application Cost ($) per Remittance

<table>
<thead>
<tr>
<th></th>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cost ($)</td>
<td>11.24</td>
<td>1.89</td>
</tr>
</tbody>
</table>

#### Cash Application Remittances per FTE

<table>
<thead>
<tr>
<th></th>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
</tr>
</thead>
<tbody>
<tr>
<td>Remittances per FTE</td>
<td>28,749</td>
<td>29,174</td>
</tr>
</tbody>
</table>

### Cash Application Best Practices

<table>
<thead>
<tr>
<th>Best Practice</th>
<th>State of Ohio</th>
<th>Top Performers</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cash application policy/ procedure standardization</td>
<td>95%</td>
<td>na</td>
</tr>
<tr>
<td>Percent cash application transactions automated</td>
<td>29%</td>
<td>97%</td>
</tr>
<tr>
<td>Average time to apply cash (days)</td>
<td>3</td>
<td>1</td>
</tr>
<tr>
<td>Automatic cash application rate</td>
<td>47%</td>
<td>94%</td>
</tr>
<tr>
<td>Days Sales Outstanding ('DSO')</td>
<td>48</td>
<td>24</td>
</tr>
<tr>
<td>Credit sales are collected within terms</td>
<td>73%</td>
<td>94%</td>
</tr>
<tr>
<td>Established mechanism to track root causes of adjustments and customer disputes</td>
<td>43%</td>
<td>na</td>
</tr>
<tr>
<td>Process to reduce those issues resulting in adjustments and customer disputes</td>
<td>35%</td>
<td>na</td>
</tr>
</tbody>
</table>

*na = New Question/Small Sample Size
General Accounting and External Reporting Metrics

**Percent Automated Journal Entries**
- State of Ohio: 67%
- Comparable Orgs: 60%
- Top Performers: 95%

**Active General Ledger Accounts**
- State of Ohio: 1,614
- Comparable Orgs: 748
- NASACT Median: 1,289
- World-Class: 1,695

**General Accounting: Days to Close**
- State of Ohio: 11.7 days
- Comparable Orgs: 6.8 days
- Top Performers: 5.0 days
- World-Class: 3.0 days

<table>
<thead>
<tr>
<th>FTE Distribution</th>
<th>State of Ohio</th>
</tr>
</thead>
<tbody>
<tr>
<td>Fixed Assets</td>
<td>51.7</td>
</tr>
<tr>
<td>Intercompany Accounting</td>
<td>19.8</td>
</tr>
<tr>
<td>General Accounting</td>
<td>63.4</td>
</tr>
<tr>
<td>Cost Accounting</td>
<td>14.6</td>
</tr>
<tr>
<td>External Reporting</td>
<td>43.6</td>
</tr>
</tbody>
</table>

State of Ohio Finance Rapid Benchmark Report

February 13, 2008
General Accounting and External Reporting Practices

- Extent policies/procedures for general acctg/external rptg are standardized across business units
- Integration of fixed assets applications with purchasing/accounts payable applications
- Integration of fixed assets applications with general ledger applications

- Percent of time you have to restate external earnings reports after being released to external agencies or commissions

- Percent of regulatory filings and forms which can be automatically produced from a common regulatory reporting application

The Hackett Group
February 13, 2008
Control and Risk Management Costs and Staffing Levels

Process Cost as a % of Operating Budget

- **Treasury Management**
  - State of Ohio: 0.11%
  - NASACT Median: 0.01%
  - Comparable Orgs: 0.02%
  - World-Class: 0.02%

- **Compliance Management**
  - State of Ohio: 0.09%
  - NASACT Median: 0.04%
  - Comparable Orgs: 0.07%
  - World-Class: 0.07%

Control and Risk Management FTEs

- **Treasury Management**
  - State of Ohio: 41.9
  - NASACT Median: 18.5
  - Comparable Orgs: 19.0
  - World-Class: 19.6

- **Compliance Management**
  - State of Ohio: 88.1
  - NASACT Median: 52.5
  - Comparable Orgs: 30.6
  - World-Class: 32.0
## Treasury Management Practices

### Bank Accounts per State of Ohio’s Operating Budget

<table>
<thead>
<tr>
<th>State of Ohio</th>
<th>NASACT Median</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>769</td>
<td>327</td>
<td>183</td>
<td>246</td>
</tr>
</tbody>
</table>

### Annual Gross Banking Fees per State of Ohio’s Operating Budget ($)

<table>
<thead>
<tr>
<th>State of Ohio</th>
<th>NASACT Median</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>4,259,200</td>
<td>2,492,925</td>
<td>2,196,347</td>
<td>1,565,195</td>
</tr>
</tbody>
</table>

### Treasury Management FTE Distribution

- Cash Management: 80%
- Capital and Risk Management: 20%

### % of Cash Transactions with Daily Cash Positioning and Funds Mobilization Automated

- State of Ohio: 45%
- Comparable Orgs: 49%
- World-Class: 95%
Compliance Management Practices

Engagement Distribution

<table>
<thead>
<tr>
<th>Category</th>
<th>% of Locations Audited Annually</th>
</tr>
</thead>
<tbody>
<tr>
<td>Financial</td>
<td>84%</td>
</tr>
<tr>
<td>Technology</td>
<td>74%</td>
</tr>
<tr>
<td>Special Requests</td>
<td>58%</td>
</tr>
<tr>
<td>External Audit Support</td>
<td>64%</td>
</tr>
<tr>
<td>Operations</td>
<td></td>
</tr>
</tbody>
</table>

External Audit Fees per State of Ohio's Operating Budget ($)

- State of Ohio: 1,572,128
- NASACT Median: 1,236,448
- Comparable Orgs: 3,490,662
- World-Class: 3,490,662
Planning and Strategy and Function Management Costs and Staffing Levels

Process Cost as a % of Operating Budget

Planning and Performance Management
- State of Ohio: 0.08%
- NASACT Median: 0.07%
- Comparable Orgs: 0.05%
- World-Class: 0.09%

Business Analysis
- State of Ohio: 0.02%
- NASACT Median: 0.03%
- Comparable Orgs: 0.05%
- World-Class: 0.05%

Management and Administration
- State of Ohio: 0.05%
- NASACT Median: 0.05%
- Comparable Orgs: 0.05%
- World-Class: 0.05%

Planning and Strategy FTEs

Planning and Performance Management
- State of Ohio: 79.7
- NASACT Median: 66.8
- Comparable Orgs: 90.3
- World-Class: 71.1

Business Analysis
- State of Ohio: 71.2
- NASACT Median: 53.4
- Comparable Orgs: 53.4
- World-Class: 28.0

Management and Administration
- State of Ohio: 65.2
- NASACT Median: 35.3
- Comparable Orgs: 43.4
- World-Class: 48.4
Budgeting Practices

Days to Complete the Budget

Operations Managers Entering Budgets Online

Number of Line Items in the Budget

The Hackett Group
February 13, 2008
Planning and Performance Management Metrics

### Annual Performance Reports Issued

<table>
<thead>
<tr>
<th></th>
<th>State of Ohio</th>
<th>NASACT Median</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Days</td>
<td>6,092</td>
<td>17,361</td>
<td>10,656</td>
<td>10,092</td>
</tr>
</tbody>
</table>

### Days to Report Key Operating Results to Management

<table>
<thead>
<tr>
<th></th>
<th>State of Ohio</th>
<th>NASACT Median</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Days</td>
<td>7</td>
<td>1</td>
<td>3</td>
<td>1</td>
</tr>
</tbody>
</table>

### Planning Best Practices

<table>
<thead>
<tr>
<th>Planning Best Practices</th>
<th>State of Ohio</th>
<th>Top Performers</th>
</tr>
</thead>
<tbody>
<tr>
<td>Management reports created using PC spreadsheets as primary application</td>
<td>75%</td>
<td>50%</td>
</tr>
<tr>
<td>Reports distributed electronically</td>
<td>57%</td>
<td>95%</td>
</tr>
<tr>
<td>Percent of time reports address future action instead of explanation of history</td>
<td>30%</td>
<td>50%</td>
</tr>
<tr>
<td>Extent balanced scorecard, which combines operational and financial measures, has been developed</td>
<td>No development</td>
<td>Mature Scorecard</td>
</tr>
</tbody>
</table>

### Business Days to Prepare Ad Hoc Business Performance Reports

<table>
<thead>
<tr>
<th></th>
<th>State of Ohio</th>
<th>NASACT Median</th>
<th>Comparable Orgs</th>
<th>Top Performers</th>
</tr>
</thead>
<tbody>
<tr>
<td>Days</td>
<td>3</td>
<td>3</td>
<td>2</td>
<td>1</td>
</tr>
</tbody>
</table>
Performance Reporting Practices

Use of Data Management and Analysis Tools (Data Warehousing/Data Marts)
- High
- Med
- Low
- None

Extent Internet Supports Online Distribution of Standard Reports
- High
- Med
- Low
- None

Extent Internet Supports Online, Self-service for Standard Reports
- High
- Med
- Low
- None

State of Ohio
Comparable Orgs
World-Class

- State of Ohio
- Comparable Orgs
- World-Class

The Hackett Group
February 13, 2008

State of Ohio Finance Rapid Benchmark Report
Page 35 of x
Business Analysis Practices

Allocation of Analysts' Time for Standard Reports

Top Performers: 36% Collecting/Compiling Data, 64% Analyzing Information
Comparable Orgs: 55% Collecting/Compiling Data, 45% Analyzing Information
NASACT Median: 49% Collecting/Compiling Data, 51% Analyzing Information
State of Ohio: 49% Collecting/Compiling Data, 51% Analyzing Information

% of Time Analytical Focus is on Proactive Planning vs. Historical Reporting

State of Ohio: 44%, Comparable Orgs: 43%, NASACT Median: 50%, World-Class: 62%

Analysis Output on Target for Pricing Decisions

State of Ohio: 73%, Comparable Orgs: 78%, NASACT Median: 76%, World-Class: 95%

Percent of Time Output of the Cost Analysis is Considered on Target by Internal Customers

State of Ohio: 82%, Comparable Orgs: 82%, NASACT Median: 80%, World-Class: 90%
Table of Contents

- Section One
  Sponsor’s Letter
- Section Two
  Executive Summary
- Section Three
  Appendix
  - Section One
    Introduction – pages 1 - 7
  - Section Two
  - Section Three
    Technology Rapid Benchmark Report – pages 1 - 51
  - Section Four
    Procurement Rapid Benchmark Report – pages 1 - 52
  - Section Five
    Human Resources Rapid Benchmark Report – pages 1 - 52
  - Section Six
    Achieving World-Class Performance – pages 1 - 3
  - Section Seven
    About The Hackett Group – pages 1 - 5
Efficiency and Effectiveness Ranking as Calculated by The Hackett Group’s IT Value Grid

- IT costs for the in scope processes were $660.6 million
  - Total IT cost of $660.6M equates to $9,364 per end user (2nd quartile)
  - Higher staffing levels with a higher Manager staff mix
  - Lower fully-loaded labor rates in comparison
  - 42% focus on Technology Infrastructure and 16% focus on Planning & Strategy likely due to duplicated efforts across the agencies

- IT scores third quartile on the Hackett Value Grid for efficiency
  - Lower efficiency plotting on the value grid is due to overall costs, staffing & productivity, cycle times and complexity

- IT scores second quartile on the Hackett Value Grid for effectiveness:
  - Effectiveness plotting attributed to IT role, talent management, economic return, quality, information access and overall management
IT Demographics Comparison – Ohio and the Large Diverse Organization Slice of the Hackett Database

Countries

- 1
- 2 - 5
- 6 - 25
- 26 - 100
- > 100
- World-Class Range
- Comparable Orgs Median
- State of Ohio

Operating locations

- < 25
- 25 - 50
- 50 - 100
- 100 - 250
- > 250
- World-Class Range
- Comparable Orgs Median
- State of Ohio

Employees

- < 2,500
- 2,500 – 5,000
- 5,000 – 10,000
- 10,000 – 25,000
- > 25,000
- World-Class Range
- Comparable Orgs Median
- State of Ohio

Operating Budget (BN $US)

- < $1B
- $1 - $5B
- $5 - $10B
- > $10B
- World-Class Range
- Comparable Orgs Median
- State of Ohio

End Users

- < 3,000
- 3,000 – 5,000
- 5,000 – 10,000
- 10,000 – 20,000
- > 20,000
- World-Class Range
- Comparable Orgs Median
- State of Ohio
IT Participants in the Large Diverse Organization Slice of the Hackett Database

- Agilent Technologies, Inc.
- Alcoa, Inc.
- Bayer AG
- Caterpillar, Inc.
- Celestica Inc.
- Cendant Corporation
- Cingular Wireless LLC
- Citigroup Inc.
- E.I. du Pont de Nemours and Company
- Eastman Chemical Company
- General Electric Company
- Georgia-Pacific Corporation
- Halliburton
- Heineken N.V.
- Henkel KGaA
- Honeywell International Inc.
- International Paper Company
- Lucent Technologies Inc.
- Mattel Inc.
- Meadwestvaco
- Motorola, Inc.
- NCR Corporation
- Novartis Consumer Health Inc
- Pioneer Companies, Inc.
- Raytheon Company
- Renault SA
- The Stanley Works
- Tetra Pak International
- The Timken Company
- Unisys Corporation
- USAA
- Whirlpool Corporation
- Yum Brands, Inc.
Data was Collected in Accordance with Hackett’s IT Taxonomy of 11 Processes

<table>
<thead>
<tr>
<th>Technology Infrastructure</th>
<th>Application Management</th>
<th>*Planning and Strategy</th>
<th>Management and Administration</th>
</tr>
</thead>
<tbody>
<tr>
<td>Infrastructure Management</td>
<td>Application Maintenance</td>
<td>IT Business Planning</td>
<td>Function Management</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
|  |  |  |  | |(*) For comparison purposes, Control & Risk Management will be included in the Planning & Strategy Process Group

The Hackett Group
February 13, 2008
State of Ohio’s Baseline of Annual IT Cost

$660.6 Million

End Users  70,554
Labor  $259.9 million
Outsourcing  $105.5 million
Technology  $254.5 million
Other  $40.7 million

IT Cost ($) per End User

State of Ohio  9,364
Comparable Orgs  9,443
World-Class  9,198

IT Staffing (FTEs)

State of Ohio  2670.0
Comparable Orgs  2430.2
World-Class  1554.4

The Hackett Group
February 13, 2008
State of Ohio’s Volumes Related to the Large Diverse Organizations

Help Desk Calls and Suppliers

- Help Desk Calls (in thousands):
  - State of Ohio: 363
  - Comparable Orgs: 927

- Suppliers:
  - State of Ohio: 6,192
  - Comparable Orgs: 875
Efficiency and Effectiveness Ranking as Calculated by The Hackett Group’s IT Value Grid

Note: The colors are only a representation of gaps to World-Class and are not a direct indicator of where to focus/launch any initiative. Specific action plans should not be developed until after the benchmark results are assessed within the context of the functional and business strategies.
Higher Complexity is Driving Up Overall Process Costs

IT Process Cost Allocation ($) per End User
(includes labor and outsourcing)

Number of Suppliers per Thousand End Users

Programming Languages

Databases Platforms

1897 Customer Database Profiles

The Hackett Group
February 13, 2008
Shifting Resources from Technology Infrastructure to Application Management May Improve Effectiveness for the Organization Overall

World-Class organizations leverage technology to outperform their peers and view IT as an enabler instead of cost center. IT works with the other functions and the business units to eliminate unnecessary complexity in their application portfolio and the infrastructure, which decreases the cost of ‘keeping the lights on’, resulting in more discretionary dollars. Attacking complexity requires an investment, support from top leadership, and coordination across the enterprise.
## State of Ohio’s IT Cost Differences

<table>
<thead>
<tr>
<th>IT Processes</th>
<th>State of Ohio's Costs (in Millions)</th>
<th>State of OH’s Gap to Comp Orgs (in Millions)</th>
<th>State of Ohio's Gap to World-Class (in Millions)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Technology Infrastructure</td>
<td>162.5</td>
<td>19.9</td>
<td>59.0</td>
</tr>
<tr>
<td>Application Management</td>
<td>132.8</td>
<td>(39.6)</td>
<td>(58.0)</td>
</tr>
<tr>
<td>Planning and Strategy</td>
<td>48.1</td>
<td>29.1</td>
<td>33.9</td>
</tr>
<tr>
<td>Management and Administration</td>
<td>22.0</td>
<td>0.2</td>
<td>2.7</td>
</tr>
<tr>
<td>Total Process Costs</td>
<td>365.4</td>
<td>9.7</td>
<td>37.5</td>
</tr>
<tr>
<td>Technology Cost</td>
<td>254.5</td>
<td>(18.0)</td>
<td>(35.1)</td>
</tr>
<tr>
<td>Other Cost</td>
<td>40.7</td>
<td>2.6</td>
<td>9.3</td>
</tr>
<tr>
<td>Total IT Cost</td>
<td>660.6</td>
<td>(5.6)</td>
<td>11.7</td>
</tr>
</tbody>
</table>

**Comments**

Cost Differences: The cost differences shown are mathematical calculations intended to give an understanding of processes with potential for performance improvement. Areas of focus and actual performance improvement targets should be developed only after considering issues such as organizational structure, business requirements, regulatory requirements, investments required and other factors.

*Values in $.*
State of Ohio's Cost Distribution Across Labor, Outsourcing, Technology and Other Categories

Process Cost Allocation (includes labor and outsourcing)

- Technology Infrastructure: 45%
- Application Management: 36%
- Planning and Strategy: 13%
- IT Management and Administration: 6%
- Other: 2%

Technology Cost Distribution
IT – Technology Cost – 254,543,046
- Hardware and Software: 61%
- Voice & Data Communication: 14%
- Depreciation: 25%

IT Other Cost Distribution
IT – Other Cost – 40,697,940
- Facilities and Overhead: 55%
- Travel and Expense: 30%
- Training: 4%
- Other: 2%
Technology Cost per End User and Technology Cost per FTE

Technology Cost ($) per End User

- State of Ohio: $3,608
- Comparable Orgs: $3,862
- World-Class: $4,105

Technology Cost ($) per FTE

- State of Ohio: $95,335
- Comparable Orgs: $112,126
- World-Class: $186,311

Comments

- **Technology**: Top performing companies typically have higher technology cost per End User and technology cost per FTE, with lower actual FTE counts in total.
- Technology costs include hardware, software, depreciation, networking, telecommunications and support costs.
- Technology Cost will vary based upon the age of the applications and the stage of the investment cycle.
- **Best Practice**: Standardize and simplify technology across the enterprise.
Reporting, Executive Committee Participation and Budgetary Control

**Reporting Channel of Senior IT Leader**

- **World-Class**
  - CIO: 12%
  - President: 38%
  - CEO or Chairman: 27%
  - CFO: 9%
  - COO or Senior officer: 3%
  - Other: 3%

- **Comparable Orgs**
  - CIO: 34%
  - President: 27%
  - CEO or Chairman: 38%
  - CFO: 12%
  - COO or Senior officer: 3%
  - Other: 3%

**CIO Member of Senior Executive Committee (World-Class comparison)**

- **World-Class**
  - Yes: 75%
  - No: 25%

- **Comparable Orgs**
  - Yes: 56%
  - No: 44%

- **State of Ohio**
  - Yes: 64%
  - No: 36%

**% of Total IT Budget Controlled by IT Executive**

- **State of Ohio**
  - Yes: 94%
  - No: 97%

**Best Practice - Sr. IT Lead reports to CEO**

- **State-wide CIO reports to Governor**
  - Director or Deputy Director: 4%
  - Other: 7%
  - State-wide: 59%

**Best Practice - Sr. IT Leader is member of Exec committee**

**Best Practice - IT controls 100% of the budget**
IT Management & Administration FTEs and Cost

IT Management & Administration Process Cost ($) per End User

- State of Ohio: 305
- Comparable Orgs: 292
- World-Class: 259

IT Management & Administration FTEs

- State of Ohio: 203.2
- Comparable Orgs: 195.1
- World-Class: 138.5

Legend:
- Yellow: State of Ohio
- Green: Comparable Orgs
- Blue: World-Class

The Hackett Group
February 13, 2008
Technology Infrastructure FTEs and Costs

Technology Infrastructure Process Cost ($) per End User

<table>
<thead>
<tr>
<th>Process Group</th>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>874</td>
<td>822</td>
<td>798</td>
</tr>
<tr>
<td></td>
<td>1,429</td>
<td>1,199</td>
<td>669</td>
</tr>
</tbody>
</table>

State of Ohio's Technology Infrastructure Process Cost ($) by Process Group

<table>
<thead>
<tr>
<th>Process Group</th>
<th>Cost ($)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Infrastructure</td>
<td>26,398,446</td>
</tr>
<tr>
<td>Development</td>
<td>41,054,153</td>
</tr>
<tr>
<td>Management</td>
<td>95,037,397</td>
</tr>
<tr>
<td>End User Support</td>
<td></td>
</tr>
</tbody>
</table>

Technology Infrastructure Staffing (FTEs)

<table>
<thead>
<tr>
<th>Process Group</th>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>1,133.8</td>
<td>809.4</td>
<td>707.8</td>
</tr>
</tbody>
</table>
Application Management FTEs and Costs

Application Management Process Cost ($) per End User

<table>
<thead>
<tr>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>553</td>
<td>486</td>
<td>879</td>
</tr>
<tr>
<td>1,329</td>
<td>1,957</td>
<td>1,825</td>
</tr>
</tbody>
</table>

Application Management Process Cost ($) by Process Group

- Application Development and Implementation: 79,198,744
- Application Maintenance: 53,568,882

Application Management Staffing (FTEs)

<table>
<thead>
<tr>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>12.7</td>
<td>18.1</td>
<td>8.8</td>
</tr>
</tbody>
</table>
State of Ohio’s Process Cost Allocation

Process Cost Allocation (includes labor and outsourcing)

- Technology Infrastructure: 45%
- Application Management: 36%
- Planning and Strategy: 13%
- IT Management and Administration: 6%
State of Ohio's Technology and Other Costs

Technology Cost Distribution
IT – Technology Cost – 254,543,046

- Hardware and Software: 25%
- Voice & Data Communication: 14%
- Depreciation: 61%

IT Other Cost Distribution
IT – Other Cost – 40,697,940

- Facilities and Overhead: 39%
- Travel and Expense: 2%
- Training: 4%
- Other: 55%
Positioning by quartile on this chart is on a cost basis only. It does not take into account effectiveness of services provided. Your company's cost per end user result is provided in the left hand chart.
World-Class Organizations Leverage Technology to Fundamentally Outperform Comparable Orgs* Across the Board

Hackett 2007 Functional Performance Data - Select SG&A Functions

<table>
<thead>
<tr>
<th>Function</th>
<th>Median</th>
<th>WC</th>
<th>Overall IT cost per end user</th>
<th>Overall Finance cost as a % of revenue</th>
<th>Overall HR cost per employee</th>
<th>Overall Procurement cost as a % of spend</th>
</tr>
</thead>
<tbody>
<tr>
<td>IT</td>
<td></td>
<td></td>
<td>8,701</td>
<td>1.24%</td>
<td>1,995</td>
<td>0.82%</td>
</tr>
<tr>
<td>FINANCE</td>
<td></td>
<td></td>
<td>9,198</td>
<td>51%</td>
<td>1,822</td>
<td>23%</td>
</tr>
<tr>
<td>HUMAN RESOURCES</td>
<td></td>
<td></td>
<td></td>
<td>0.61%</td>
<td></td>
<td>0.63%</td>
</tr>
<tr>
<td>PROCUREMENT</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

World-class are investing more in Information Technology

Where is the opportunity for IT to add value?

* “Comparable Orgs” refer to the median of the overall IT database. The comparable org median on this slide is different than the selected comparable org group for your organization.
Excellence is no Accident... World-Class Organizations Operate and Perform Very Differently than Median Comparable Orgs*

- World-Class companies view IT as an enabler instead of cost center. IT works with the other functions and the business units to eliminate unnecessary complexity in their application portfolio and the infrastructure, which decreases the cost of ‘keeping the lights on’, resulting in more discretionary dollars. Attacking complexity requires an investment, support from top leadership, and coordination across the enterprise.

- World-Class companies spend more in comparison to non world-class companies. World-Class companies invest more in technology and pay more to get and keep the right IT talent.

<table>
<thead>
<tr>
<th>IT</th>
<th>Overall IT cost per end user</th>
</tr>
</thead>
<tbody>
<tr>
<td>Median</td>
<td>$8,701</td>
</tr>
<tr>
<td>WC</td>
<td>$9,198</td>
</tr>
</tbody>
</table>

*“Comparable Orgs” refers to the median of the overall IT database. The comparable org median on this slide is different than the selected comparable org group for your organization.*
State of Ohio's Cost Distribution by Percentage

**IT Cost Distribution ($)**

<table>
<thead>
<tr>
<th></th>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Labor Cost</td>
<td>39%</td>
<td>39%</td>
<td>39%</td>
</tr>
<tr>
<td>Outsourcing Cost</td>
<td>16%</td>
<td>14%</td>
<td>19%</td>
</tr>
<tr>
<td>Technology Cost</td>
<td>41%</td>
<td>45%</td>
<td></td>
</tr>
<tr>
<td>Other Cost</td>
<td>39%</td>
<td>39%</td>
<td>32%</td>
</tr>
</tbody>
</table>

**Outsourcing Cost Distribution**

Labor vs. Technology

<table>
<thead>
<tr>
<th></th>
<th>State of Ohio</th>
</tr>
</thead>
<tbody>
<tr>
<td>Technology Component</td>
<td>52%</td>
</tr>
<tr>
<td>Labor Component</td>
<td>48%</td>
</tr>
</tbody>
</table>
Technology Cost per End User and Technology Cost per FTE

Technology Cost ($) per End User

- State of Ohio: 3,608
- Comparable Orgs: 3,862
- World-Class: 4,105

Technology Cost ($) per FTE

- State of Ohio: 95,335
- Comparable Orgs: 112,126
- World-Class: 186,311

Comments

- **Technology:** Top performing companies typically have higher technology cost per End User and technology cost per FTE, with lower actual FTE counts in total.
- Technology costs include hardware, software, depreciation, networking, telecommunications and support costs.
- Technology Cost will vary based upon the age of the applications and the stage of the investment cycle.
- **Best Practice:** Standardize and simplify technology across the enterprise.
## State of Ohio’s IT Cost Differences

<table>
<thead>
<tr>
<th>IT Processes</th>
<th>State of Ohio's Costs (in Millions)</th>
<th>State of OH's Gap to Comp Orgs (in Millions)</th>
<th>State of Ohio's Gap to World-Class (in Millions)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Technology Infrastructure</td>
<td>162.5</td>
<td>19.9</td>
<td>59.0</td>
</tr>
<tr>
<td>Application Management</td>
<td>132.8</td>
<td>(39.6)</td>
<td>(58.0)</td>
</tr>
<tr>
<td>Planning and Strategy</td>
<td>48.1</td>
<td>29.1</td>
<td>33.9</td>
</tr>
<tr>
<td>Management and Administration</td>
<td>22.0</td>
<td>0.2</td>
<td>2.7</td>
</tr>
<tr>
<td>Total Process Costs</td>
<td>365.4</td>
<td>9.7</td>
<td>37.5</td>
</tr>
<tr>
<td>Technology Cost</td>
<td>254.5</td>
<td>(18.0)</td>
<td>(35.1)</td>
</tr>
<tr>
<td>Other Cost</td>
<td>40.7</td>
<td>2.6</td>
<td>9.3</td>
</tr>
<tr>
<td>Total IT Cost</td>
<td>660.6</td>
<td>(5.6)</td>
<td>11.7</td>
</tr>
</tbody>
</table>

### Comments

**Cost Differences:** The cost differences shown are mathematical calculations intended to give an understanding of processes with potential for performance improvement. Areas of focus and actual performance improvement targets should be developed only after considering issues such as organizational structure, business requirements, regulatory requirements, investments required and other factors.

* Values in $.
IT Staffing and Labor Rates

- **IT FTEs**
  - State of Ohio: 2670.0
  - Comparable Orgs: 2430.2
  - World-Class: 1,554.4

- **Average IT Fully Loaded Labor Cost ($)**
  - State of Ohio: 97,328
  - Comparable Orgs: 107,514
  - World-Class: 133,694
IT Overall Staffing and Resource Allocation

IT Staffing (FTEs)

<table>
<thead>
<tr>
<th>Category</th>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Technology</td>
<td>203.2</td>
<td>195.1</td>
<td>138.5</td>
</tr>
<tr>
<td>Infrastructure</td>
<td>438.5</td>
<td>146.8</td>
<td>91.0</td>
</tr>
<tr>
<td>Planning and</td>
<td>894.5</td>
<td>1279.0</td>
<td>1554.4</td>
</tr>
<tr>
<td>Strategy</td>
<td>1133.8</td>
<td>809.4</td>
<td>707.8</td>
</tr>
</tbody>
</table>

IT Resource Allocation

<table>
<thead>
<tr>
<th>Category</th>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Technology</td>
<td>42%</td>
<td>33%</td>
<td>46%</td>
</tr>
<tr>
<td>Infrastructure</td>
<td>34%</td>
<td>53%</td>
<td>40%</td>
</tr>
<tr>
<td>Planning and</td>
<td>16%</td>
<td>8%</td>
<td>9%</td>
</tr>
<tr>
<td>Strategy</td>
<td>8%</td>
<td>6%</td>
<td>6%</td>
</tr>
<tr>
<td>Management</td>
<td>16%</td>
<td>8%</td>
<td>8%</td>
</tr>
<tr>
<td>IT</td>
<td>34%</td>
<td>53%</td>
<td>40%</td>
</tr>
</tbody>
</table>
IT Staffing and Resource Allocation by Process

IT Resource Allocation

<table>
<thead>
<tr>
<th>Process</th>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Technology Infrastructure</td>
<td>1,279.0</td>
<td>894.5</td>
<td>438.5</td>
</tr>
<tr>
<td>Application Management</td>
<td>809.4</td>
<td>707.8</td>
<td>617.1</td>
</tr>
<tr>
<td>Planning and Strategy</td>
<td>438.5</td>
<td>146.8</td>
<td>91.0</td>
</tr>
<tr>
<td>IT Management and Admin</td>
<td>203.2</td>
<td>195.1</td>
<td>138.5</td>
</tr>
</tbody>
</table>

IT Staffing (FTEs) per 1000 End Users

<table>
<thead>
<tr>
<th>Process</th>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Technology Infrastructure</td>
<td>16.1</td>
<td>11.5</td>
<td>10.0</td>
</tr>
<tr>
<td>Application Management</td>
<td>12.7</td>
<td>18.1</td>
<td>8.8</td>
</tr>
<tr>
<td>Planning and Strategy</td>
<td>6.2</td>
<td>2.1</td>
<td>1.3</td>
</tr>
<tr>
<td>IT Management and Admin</td>
<td>2.9</td>
<td>2.8</td>
<td>2.0</td>
</tr>
</tbody>
</table>
Staff Mix and Span of Control

Staff Mix

<table>
<thead>
<tr>
<th>Category</th>
<th>Manager</th>
<th>Professional</th>
<th>Clerical</th>
</tr>
</thead>
<tbody>
<tr>
<td>World-Class</td>
<td>14%</td>
<td>85%</td>
<td>1%</td>
</tr>
<tr>
<td>Comparable Orgs</td>
<td>13%</td>
<td>84%</td>
<td>3%</td>
</tr>
<tr>
<td>State of Ohio</td>
<td>17%</td>
<td>78%</td>
<td>5%</td>
</tr>
</tbody>
</table>

Number of Staff to Managers (Span of Control)

<table>
<thead>
<tr>
<th>Organization</th>
<th>Number of Staff to Managers</th>
</tr>
</thead>
<tbody>
<tr>
<td>State of Ohio</td>
<td>4.8</td>
</tr>
<tr>
<td>Comparable Orgs</td>
<td>5.2</td>
</tr>
<tr>
<td>World-Class</td>
<td>6.2</td>
</tr>
</tbody>
</table>
Formal Business Experience and Turnover of the IT Staff

Advanced Business Degrees

<table>
<thead>
<tr>
<th></th>
<th>Managers</th>
<th>Professionals</th>
</tr>
</thead>
<tbody>
<tr>
<td>State of Ohio</td>
<td>16%</td>
<td>11%</td>
</tr>
<tr>
<td>Comparable Orgs</td>
<td>27%</td>
<td>13%</td>
</tr>
<tr>
<td>World-Class</td>
<td>23%</td>
<td>7%</td>
</tr>
</tbody>
</table>

Turnover

<table>
<thead>
<tr>
<th></th>
<th>Managers</th>
<th>Professionals</th>
</tr>
</thead>
<tbody>
<tr>
<td>State of Ohio</td>
<td>13%</td>
<td>15%</td>
</tr>
<tr>
<td>Comparable Orgs</td>
<td>5%</td>
<td>5%</td>
</tr>
<tr>
<td>World-Class</td>
<td>8%</td>
<td>5%</td>
</tr>
</tbody>
</table>
IT Total Cost Allocation and Process Cost Allocation per End User

IT Process Cost Allocation per End User

- State of Ohio: 36% Labor Cost, 16% Outsourcing Cost
- Comparable Orgs: 39% Labor Cost, 14% Outsourcing Cost
- World-Class: 32% Labor Cost, 19% Outsourcing Cost

IT Process Cost Allocation ($) per End User
(includes labor and outsourcing)

- Technology Infrastructure: State of Ohio $2,303, Comparable Orgs $2,443, World-Class $2,704
- Application Management: State of Ohio $2,021, Comparable Orgs $1,882, World-Class $1,467
- Planning and Strategy: State of Ohio $682, Comparable Orgs $202
- IT Management and Administration: State of Ohio $312, Comparable Orgs $309, World-Class $274

The Hackett Group
February 13, 2008
State of Ohio’s Labor Cost by Process Group

Labor Cost per by Process Group (in $ Millions)

Labor Cost - $259.86 Million

State of Ohio
- Technology Infrastructure: 100.8
- Application Management: 93.8
- Planning and Strategy: 43.8
- IT Management and Administration: 21.5

Comparable Orgs
- Technology Infrastructure: 138.1
- Application Management: 84.6
- Planning and Strategy: 18.0
- IT Management and Administration: 20.6

World-Class
- Technology Infrastructure: 128.8
- Application Management: 47.2
- Planning and Strategy: 13.6
- IT Management and Administration: 18.2

Legend:
- Technology Infrastructure
- Application Management
- Planning and Strategy
- IT Management and Administration
IT Staffing Allocation in Relation to Process Cost Allocation

**Total IT Staffing Allocation**

- **State of Ohio**: 8% Technology Infrastructure, 16% Application Management, 34% Planning and Strategy, 42% IT Management and Administration
- **Comparable Orgs**: 8% Technology Infrastructure, 6% Application Management, 6% Planning and Strategy, 33% IT Management and Administration
- **World-Class**: 9% Technology Infrastructure, 6% Application Management, 6% Planning and Strategy, 40% IT Management and Administration

**Total IT Process Cost Allocation** (includes labor and outsourcing)

- **State of Ohio**: 6% Technology Infrastructure, 13% Application Management, 5% Planning and Strategy, 48% IT Management and Administration
- **Comparable Orgs**: 6% Technology Infrastructure, 5% Application Management, 4% Planning and Strategy, 48% IT Management and Administration
- **World-Class**: 6% Technology Infrastructure, 4% Application Management, 4% Planning and Strategy, 58% IT Management and Administration
Percentage of Outsourcing to Total IT Cost

Percent of Outsourcing to Total IT Cost

- **State of Ohio**: 84% Outsourcing
- **Comparable Orgs**: 86% Outsourcing
- **World-Class**: 81% Outsourcing

Legend:
- Labor, Technology and Other Cost
- Outsourcing Cost
Reporting, Executive Committee Participation and Budgetary Control

**Reporting Channel of Senior IT Leader**

<table>
<thead>
<tr>
<th>World-Class</th>
<th>Comparable Orgs</th>
</tr>
</thead>
<tbody>
<tr>
<td>12%</td>
<td>3%</td>
</tr>
<tr>
<td>38%</td>
<td>9%</td>
</tr>
<tr>
<td>27%</td>
<td>34%</td>
</tr>
</tbody>
</table>

- President: 38%
- CEO or Chairman: 12%
- CFO: 12%
- COO or Senior officer: 7%
- Other: 7%

**CIO Member of Senior Executive Committee (World-Class comparison)**

<table>
<thead>
<tr>
<th>World-Class</th>
<th>Comparable Orgs</th>
</tr>
</thead>
<tbody>
<tr>
<td>75%</td>
<td>56%</td>
</tr>
<tr>
<td>25%</td>
<td>44%</td>
</tr>
</tbody>
</table>

**% of Total IT Budget Controlled by IT Executive**

<table>
<thead>
<tr>
<th>World-Class</th>
<th>Comparable Orgs</th>
<th>State of Ohio</th>
</tr>
</thead>
<tbody>
<tr>
<td>94%</td>
<td>71%</td>
<td></td>
</tr>
<tr>
<td>97%</td>
<td>59%</td>
<td></td>
</tr>
</tbody>
</table>

- President: 94%
- CEO or Chairman: 71%
- CFO: 59%
- COO or Senior officer: 44%
- Other: 30%

**CIO reports to Governor**

- State-wide: Director or Deputy Director (4%)
- State of Ohio: Director or Deputy Director (30%)
- Comparable Orgs: Director or Deputy Director (7%)
- World-Class: Director or Deputy Director (59%)

**Best Practice - Sr. IT Lead reports to CEO**

- Yes: 94%
- No: 71%

**Best Practice - Sr. IT Leader is member of Exec committee**

- Yes: 75%
- No: 25%

**Best Practice - IT controls 100% of the budget**

- Yes: 97%
- No: 94%

---

The Hackett Group
February 13, 2008
Planning & Strategy FTEs and Costs

Planning & Strategy Process Cost ($) per End User

<table>
<thead>
<tr>
<th></th>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Labor</td>
<td>438.5</td>
<td>255</td>
<td>9</td>
</tr>
<tr>
<td>Outsourcing</td>
<td>620</td>
<td>14</td>
<td>9</td>
</tr>
</tbody>
</table>

State of Ohio’s Planning & Strategy Process Cost ($) by Process Group

<table>
<thead>
<tr>
<th>Process Group</th>
<th>Cost ($)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Risk Management</td>
<td>10,449,492</td>
</tr>
<tr>
<td>Quality Assurance</td>
<td>11,355,023</td>
</tr>
<tr>
<td>Emerging Technologies</td>
<td>7,278,269</td>
</tr>
<tr>
<td>Enterprise Architecture Planning</td>
<td>7,614,351</td>
</tr>
<tr>
<td>IT Business Planning</td>
<td>11,419,326</td>
</tr>
</tbody>
</table>
IT Management & Administration FTEs and Cost

IT Management & Administration Process Cost ($) per End User

<table>
<thead>
<tr>
<th></th>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>IT Management &amp; Admin FTEs</td>
<td>203.2</td>
<td>195.1</td>
<td>138.5</td>
</tr>
<tr>
<td>Labor</td>
<td>305</td>
<td>292</td>
<td>259</td>
</tr>
<tr>
<td>Outsourcing</td>
<td>7</td>
<td>17</td>
<td>16</td>
</tr>
</tbody>
</table>

The Hackett Group
February 13, 2008
Use of Formal PMO and Standard Methods for Projects

**Formal Enterprise-wide PMO**

- High: State of Ohio: 57%, Comparable Orgs: 75%, World-Class: 98%
- Medium: None
- Low: None
- None

**Projects Managed Through a PMO**

- High: State of Ohio: 31%, Comparable Orgs: 60%, World-Class: 92%
- Medium: None
- Low: None
- None

**Projects Using Standard Methods**

- High: State of Ohio: 57%, Comparable Orgs: 75%, World-Class: 90%
- Medium: None
- Low: None
- None

*Best Practice - All large scale projects are controlled by a PMO*
Project Results

Project Delivery Success

State of Ohio Project Related Information

Projects Started in the Benchmark Period

<table>
<thead>
<tr>
<th></th>
<th>State of Ohio</th>
</tr>
</thead>
<tbody>
<tr>
<td>Infrastructure development projects</td>
<td>85</td>
</tr>
<tr>
<td>Application development projects</td>
<td>181</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th></th>
<th>State of Ohio</th>
</tr>
</thead>
<tbody>
<tr>
<td>What percent of projects deliver anticipated benefits?</td>
<td>92%</td>
</tr>
<tr>
<td>What percent of development projects have formal business cases / CB analysis?</td>
<td>53%</td>
</tr>
<tr>
<td>What percent of IT projects were managed by the PMO?</td>
<td>31%</td>
</tr>
</tbody>
</table>

Percentage Allocation Relative to ROI for the Completed Projects

<table>
<thead>
<tr>
<th></th>
<th>State of Ohio</th>
</tr>
</thead>
<tbody>
<tr>
<td>Meeting ROI</td>
<td>32%</td>
</tr>
<tr>
<td>Missing ROI</td>
<td>3%</td>
</tr>
</tbody>
</table>

Best Practice - Track all delivery metrics to ensure projects are meeting their objective and ROI
Use of Service Level Agreements for Internal and External Clients

Existence of Formal SLAs for Internal Clients

- Comparable Orgs: 49% Low, 51% High
- World-Class: 59% Low, 41% High
- State of Ohio: Low

Existence of Formal SLAs for Suppliers / Vendors

- Comparable Orgs: 75% Low
- World-Class: 25% Low, 15% High
- State of Ohio: Low

% of SLAs Being Met

- Internal: State of Ohio 72%, Comparable Orgs 73%, World-Class 89%
- External: State of Ohio 87%, Comparable Orgs 90%, World-Class 95%
Technology Infrastructure FTEs and Costs

Technology Infrastructure Process Cost ($) per End User

State of Ohio: 874
Comparable Orgs: 822
World-Class: 798

Technology Infrastructure Staffing (FTEs)

State of Ohio: 1,133.8
Comparable Orgs: 809.4
World-Class: 707.8

State of Ohio's Technology Infrastructure Process Cost ($) by Process Group

Infrastructure Development: 26,398,446
End User Support: 41,054,153
Infrastructure Management: 95,037,397
## Use of Standard Definitions and Adherence to Standards

### Percent of Organizations Utilizing Data Standard Definitions

<table>
<thead>
<tr>
<th>Category</th>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hardware acquisition</td>
<td>91%</td>
<td>96%</td>
<td>99%</td>
</tr>
<tr>
<td>Software acquisition</td>
<td>88%</td>
<td>90%</td>
<td>98%</td>
</tr>
<tr>
<td>Comm./network protocol</td>
<td>90%</td>
<td>90%</td>
<td>98%</td>
</tr>
</tbody>
</table>

### Percent of Organization Adhering to Standards

- **Best Practice** - Standards are defined and enforced 100%

<table>
<thead>
<tr>
<th>Category</th>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hardware acquisition</td>
<td>92%</td>
<td>95%</td>
<td>97%</td>
</tr>
<tr>
<td>Software acquisition</td>
<td>90%</td>
<td>90%</td>
<td>90%</td>
</tr>
<tr>
<td>Comm./network protocol</td>
<td>91%</td>
<td>98%</td>
<td>99%</td>
</tr>
</tbody>
</table>
# Database Platforms

## Databases Platforms

<table>
<thead>
<tr>
<th></th>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td># of Databases</td>
<td>46</td>
<td>13</td>
<td>14</td>
</tr>
</tbody>
</table>

## Database Profiles

<table>
<thead>
<tr>
<th>Database Profile</th>
<th># of Databases</th>
</tr>
</thead>
<tbody>
<tr>
<td>Customer</td>
<td>1897</td>
</tr>
<tr>
<td>Employee</td>
<td>102</td>
</tr>
<tr>
<td>Supplier</td>
<td>54</td>
</tr>
<tr>
<td>Product</td>
<td>1</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Primary Database Platform</th>
<th>Microsoft - SQL Server</th>
</tr>
</thead>
<tbody>
<tr>
<td>% of Business Applications using Primary Database</td>
<td>74%</td>
</tr>
<tr>
<td># of Databases supporting core Business Applications</td>
<td>82</td>
</tr>
<tr>
<td># of Databases supporting Open source</td>
<td>5</td>
</tr>
</tbody>
</table>
Programming Languages

Development Platforms Being Supported

State of Ohio: 52
Comparable Orgs: 26
World-Class: 20

J2EE/Java: 28
.NET: 60
3 GLs: 31
4 GLs: 16
OpenSource: 7

142 Development Platforms Being Supported
Help Desk Requests Supported and First Call Resolution

<table>
<thead>
<tr>
<th>Time Zones Supported</th>
<th>Yes</th>
<th>No</th>
<th>No</th>
<th>No</th>
</tr>
</thead>
<tbody>
<tr>
<td>North America</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Europe</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>APAC</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Other</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Hours of Operation</td>
<td>8x5, 10x5</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

% of First Call Resolution

- State of Ohio: 70%
- Comparable Orgs: 62%
- World-Class: 81%

Help Desk Requests per Thousand End Users

- State of Ohio: 5,138
- Comparable Orgs: 7,075
- World-Class: 13,136
## State of Ohio’s Help Desk Profile, End User Training Spend and Number of Suppliers

### State of Ohio

<table>
<thead>
<tr>
<th>How is your help desk organized</th>
<th>Centralized</th>
</tr>
</thead>
<tbody>
<tr>
<td>What is the help desk’s primary objective</td>
<td>Issue ticket-queue follow up</td>
</tr>
<tr>
<td>Target % for first call resolution</td>
<td>75</td>
</tr>
<tr>
<td>Average length of call – resolved in first contact (minutes)</td>
<td>230</td>
</tr>
<tr>
<td>Target average length of a call that’s resolved on first contact (minutes)</td>
<td>15</td>
</tr>
<tr>
<td>Average retention of help desk staff</td>
<td>Greater than two years</td>
</tr>
<tr>
<td>Degree the primary help desk is outsourced</td>
<td>None</td>
</tr>
</tbody>
</table>

### End user training spend

<table>
<thead>
<tr>
<th></th>
<th>State of Ohio</th>
</tr>
</thead>
<tbody>
<tr>
<td>Expense</td>
<td>800,823</td>
</tr>
<tr>
<td>Capitalized</td>
<td>-</td>
</tr>
</tbody>
</table>

### Number of Suppliers per Thousand End Users

<table>
<thead>
<tr>
<th></th>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hardware</td>
<td>31.0</td>
<td>2.8</td>
<td>2.1</td>
</tr>
<tr>
<td>Software</td>
<td>33.1</td>
<td>6.0</td>
<td>5.5</td>
</tr>
<tr>
<td>Contractor Services</td>
<td>23.7</td>
<td>3.6</td>
<td>1.6</td>
</tr>
</tbody>
</table>

*The Hackett Group*  
February 13, 2008
Application Management FTEs and Costs

Application Management Process Cost ($) per End User

- **State of Ohio**: 553
- **Comparable Orgs**: 486
- **World-Class**: 879

Application Management Process Cost ($) by Process Group

- **Development and Implementation**: 79,198,744
- **Maintenance**: 53,568,882

Application Management Staffing (FTEs)

- **State of Ohio**: 12.7
- **Comparable Orgs**: 18.1
- **World-Class**: 8.8
Application Management Metrics

Number of Applications Supported per 1,000 End Users

- State of Ohio: 17
- Comparable Orgs: 24
- World-Class: 15

Application Breakdown

- Product Development: 69
- Supply Chain: 19
- HR: 29
- Sales: 26
- Service: 18
- Operations: 103
- Finance: 255
- Procurement: 71
- Marketing: 167
- Executive and Corp. Svc.: 255

Application Management FTEs per Application

- State of Ohio: 0.74
- Comparable Orgs: 0.71
- World-Class: 0.71
Percentage of Transactions Performed Electronically – Automation

Transactions Performed Electronically

- Orders received: 36% (State), 45% (Comparable Orgs), 83% (World-Class)
- Invoices sent: 22% (State), 49% (Comparable Orgs), 52% (World-Class)
- Purchase orders: 45% (State), 44% (Comparable Orgs), 68% (World-Class)
- Payments made: 40% (State), 40% (Comparable Orgs), 76% (World-Class)
- Customer remittances: 36% (State), 36% (Comparable Orgs), 76% (World-Class)
- Expense reports: 45% (State), 67% (Comparable Orgs), 97% (World-Class)
- Management reports: 50% (State), 50% (Comparable Orgs), 78% (World-Class)
- Employee benefit enrollment: 40% (State), 40% (Comparable Orgs), 91% (World-Class)
- Employee records updated: 72% (State), 67% (Comparable Orgs), 97% (World-Class)
Table of Contents

- Section One
  - Sponsor’s Letter
- Section Two
  - Executive Summary
- Section Three
  - Appendix
  - Section One
    - Introduction
  - Section Two
    - Financial Rapid Benchmark Report
  - Section Three
    - Technology Rapid Benchmark Report
- Section Four
  - Procurement Rapid Benchmark Report
- Section Five
  - Human Resources Rapid Benchmark Report
- Section Six
  - Achieving World-Class Performance
- Section Seven
  - About The Hackett Group
Efficiency and Effectiveness Ranking as Calculated by The Hackett Group’s Procurement Value Grid

- Procurement costs for the in scope processes were $43.06 million
  - Total Procurement cost of $43.06m equates to 1.99% of total spend (4th quartile)
  - Higher staffing levels with a higher Clerical staff mix
  - Lower fully-loaded labor rates in comparison
  - 64% focus on Transactional processing
- Procurement scores fourth quartile on the Hackett Value Grid for efficiency
  - Low efficiency plotting on the value grid due to high overall costs, staffing & productivity, longer cycle times and low technology leverage
- Procurement scores fourth quartile on the Hackett Value Grid for effectiveness:
  - Low effectiveness plotting attributed to Procurement role, talent management, economic return, and supplier relationship
Procurement Demographics Comparison – Ohio and the Service High Complexity Organization Slice of the Hackett Database

- **Operating budget**
  - < $1B
  - $1B - $2B
  - $2B - $7B
  - $7B - $15B
  - > $15B

- **Countries**
  - One
  - 2 - 7
  - 7 - 30
  - 30 - 50
  - > 50

- **Operating locations**
  - < 18
  - 18 - 50
  - 50 - 110
  - 110 - 250
  - > 250

- **Spend ($US)**
  - < $400M
  - $400M - $1B
  - $1B - $3B
  - $3B - $10B
  - > 10B

![State of Ohio](The_Hackett_Group.png)
![Comparable Orgs Median](The_Hackett_Group.png)
![World-Class range](The_Hackett_Group.png)
Procurement Participants in the High Complexity Service Organization Slice of the Hackett Database

- 7-Eleven
- AAFES - Army and Air Force Exchange Service
- Agilent Technologies
- American Express Company
- ARINC Company
- AutoDesk, Inc.
- Cadence Design Systems, Inc.
- Carlson Companies, Inc.
- Cisco Systems, Inc.
- Citigroup Inc.
- Convergys Corporation
- DHL Worldwide Express, Inc.
- First Data Corporation
- Hewlett-Packard Company
- Honeywell International Inc.
- Intercontinental Hotels Group PLC
- Intergraph Corporation
- Janus Capital Group, Inc.
- Microsoft
- Motorola, Inc.
- Novell
- SABRE Group Holdings Inc.
- SITA
- Sprint Nextel Corporation
- Unisys Corporation
Data was Collected in Accordance with Hackett’s Procurement Taxonomy

<table>
<thead>
<tr>
<th>Operations &amp; Compliance</th>
<th>Sourcing &amp; Supply Base Management</th>
<th>Planning &amp; Strategy</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Supply Data Management</strong></td>
<td><strong>Supplier Scheduling</strong></td>
<td><strong>Customer Management</strong></td>
</tr>
<tr>
<td>– Supplier master management</td>
<td>– Supply requirements review</td>
<td>– External Customer Management*</td>
</tr>
<tr>
<td>– Item master/content management</td>
<td>– Supplier scheduling</td>
<td>– Internal Customer Management*</td>
</tr>
<tr>
<td>– Catalog management</td>
<td>– Order release</td>
<td>– Product Development and Design Support</td>
</tr>
<tr>
<td>– Contract master management</td>
<td>– Inbound tactical supply management</td>
<td></td>
</tr>
<tr>
<td><strong>Requisition and PO Processing</strong></td>
<td><strong>Delivery coordination</strong></td>
<td><strong>Sourcing and Supply Base Strategy</strong></td>
</tr>
<tr>
<td>– Requisition processing</td>
<td></td>
<td>– Sourcing and Supply Base Strategy</td>
</tr>
<tr>
<td>– Purchase order processing</td>
<td></td>
<td></td>
</tr>
<tr>
<td>– Requisition and purchase order support</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Receipt Processing</strong></td>
<td><strong>Compliance Management</strong></td>
<td><strong>Management &amp; Administration</strong></td>
</tr>
<tr>
<td>– Materials and goods</td>
<td>– Internal Compliance Management</td>
<td><strong>Function Strategy and Performance Mgmt</strong></td>
</tr>
<tr>
<td>– Services</td>
<td>– External Compliance</td>
<td></td>
</tr>
<tr>
<td><strong>Supplier Scheduling</strong></td>
<td></td>
<td><strong>Function Mgmt</strong></td>
</tr>
<tr>
<td></td>
<td></td>
<td>– Function oversight</td>
</tr>
<tr>
<td><strong>Compliance Management</strong></td>
<td></td>
<td>– Personnel mgt</td>
</tr>
<tr>
<td>– Internal Compliance Management</td>
<td></td>
<td>– Policy and procedures oversight</td>
</tr>
<tr>
<td>– External Compliance</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

* New Hackett process and excluded from comparative analysis
State of Ohio’s Baseline of Annual Procurement Cost

$43.06 Million
86.8%
4.9%
8.1%
0.2%

State of Ohio’s Baseline of Annual Procurement Cost

- Labor: $37.4 million
- Outsourcing: $0.09 million
- Technology: $3.48 million
- Other: $2.1 million

Procurement Cost as a % of Spend*

- State of Ohio: 1.99%
- Comparable Orgs: 0.62%
- World-Class: 0.63%

FTE Allocation

- Operations: 340.4
- Sourcing and Supply Base Mgmt: 58.6
- Planning and Strategy: 48.7
- Mgmt and Administration: 116.7

*Includes Customer Management

The Hackett Group
February 13, 2008
State of Ohio’s Volumes Related to the High Complexity Organizations

Procurement Transaction Volumes

- **Purchase Orders**:
  - State of OH: 124,300
  - Peer Group: 34,094

- **Receipts**:
  - State of OH: 170,131
  - Peer Group: 30,488

- **Order/Blanket Releases**:
  - State of OH: 3,230
  - Peer Group: 1,815
State of Ohio’s Baseline Resource Allocation and Staff Mix

Resource Allocation
- Operations: 69%
- Sourcing and Supply Base Mgmt: 23%
- Planning and Strategy: 5%
- Mgmt and Administration: 3%

Staff Mix
- Manager: 46%
- Professional: 32%
- Clerical: 22%
State of Ohio’s Value Grid Shows Opportunity to Improve Performance both in Efficiency & Effectiveness

Hackett Value Grid™

Effectiveness

Efficiency

Low  High

Comparative Orgs  State of Ohio

State of Ohio

Key Procurement Drivers  State of Ohio

<table>
<thead>
<tr>
<th>Key Procurement Drivers</th>
<th>State of Ohio</th>
</tr>
</thead>
<tbody>
<tr>
<td>Overall Cost</td>
<td>▲</td>
</tr>
<tr>
<td>Staffing &amp; Productivity</td>
<td>▲</td>
</tr>
<tr>
<td>Transactional Process Cost</td>
<td>▲</td>
</tr>
<tr>
<td>Cycle Time</td>
<td>£</td>
</tr>
<tr>
<td>Technology Leverage</td>
<td>▲</td>
</tr>
<tr>
<td>Role of Procurement</td>
<td>▲</td>
</tr>
<tr>
<td>Talent Management</td>
<td>▲</td>
</tr>
<tr>
<td>Internal Quality</td>
<td>£</td>
</tr>
<tr>
<td>Economic Return</td>
<td>▲</td>
</tr>
<tr>
<td>Supplier</td>
<td>▲</td>
</tr>
<tr>
<td>Information Analysis</td>
<td>£</td>
</tr>
</tbody>
</table>

Most KPIs for the Key Driver are at or near World-Class
Some KPIs for the Key Driver are at or near World-Class
Most KPIs for the Key Driver are far from World-Class
Higher Investment in Technology Cost has not Resulted in Increased Automation

Technology Cost as a % of Spend

<table>
<thead>
<tr>
<th></th>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Technology Cost as % of Spend</td>
<td>0.17%</td>
<td>0.12%</td>
<td>0.12%</td>
</tr>
</tbody>
</table>

Technology Cost ($) per FTE

<table>
<thead>
<tr>
<th></th>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Technology Cost ($) per FTE</td>
<td>6,980</td>
<td>14,585</td>
<td>24,649</td>
</tr>
</tbody>
</table>

Percent of Automated Transactions

<table>
<thead>
<tr>
<th>On-line approvals - Direct</th>
<th>On-line approvals - Indirect</th>
<th>On-line requisitioning - Direct</th>
<th>On-line requisitioning - Indirect</th>
<th>Electronic dissemination of POs to suppliers - Direct</th>
<th>Electronic dissemination of POs to suppliers - Indirect</th>
</tr>
</thead>
<tbody>
<tr>
<td>64.4%</td>
<td>25.4%</td>
<td>19.4%</td>
<td>51.2%</td>
<td>36.7%</td>
<td>5.9%</td>
</tr>
</tbody>
</table>

Top Performers

<table>
<thead>
<tr>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>Top Performers</th>
</tr>
</thead>
<tbody>
<tr>
<td>70.7%</td>
<td>45.1%</td>
<td>70.7%</td>
</tr>
<tr>
<td>57.2%</td>
<td>45.1%</td>
<td>70.7%</td>
</tr>
</tbody>
</table>
Return on Investment is Low Despite Higher Staffing within Sourcing Execution

<table>
<thead>
<tr>
<th>Allocation</th>
<th>State of Ohio</th>
<th>Comparable Organizations</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Operations</td>
<td>68%</td>
<td>46%</td>
<td>49%</td>
</tr>
<tr>
<td>Sourcing and Supply Base Management</td>
<td>23%</td>
<td>35%</td>
<td>35%</td>
</tr>
<tr>
<td>Planning &amp; Strategy</td>
<td>5%</td>
<td>9%</td>
<td>9%</td>
</tr>
<tr>
<td>Mgt &amp; Admin</td>
<td>3%</td>
<td>10%</td>
<td>7%</td>
</tr>
</tbody>
</table>

Return on Investment (Procurement Total Operating Cost)

Suppliers per State of Ohio’s Spend

Sourcing Execution FTE’s per State of Ohio’s Spend
PO Processing Cost and Staffing

**PO Processing Cost as a % of Spend**
- State of Ohio: 0.58%
- Comparable Orgs: 0.07%
- World-Class: 0.07%

**PO Processing FTE’s per State of Ohio’s Spend**
- State of Ohio: 164.8
- Comparable Orgs: 22.8
- World-Class: 19.9

**Average Fully Loaded Labor Cost Per PO Processing FTE ($)**
- State of Ohio: $71,382

**Cost per Purchase Order ($)**
- State of Ohio: $77.46
- Comparable Orgs: $10.27
- World-Class: $8.04
Requisition and Purchase Order Processing Practices

Average Ohio Cycle Time (Hours)

Comparisons not available

- Catalog-based Purchases: 29 hours
- Ad-hoc-based Purchases: 42 hours

Average Line Items per Purchase Order

- 2.7 line items
Requisition and Purchase Order Processing Practices (Cont’d)

- Percentage of requisitioners with electronic procurement access
- Automated approval generation of P.O.’s from electronic requisitions - Indirect
- Automated dissemination of P.O.’s to suppliers - Direct
- Automated dissemination of P.O.’s to suppliers - Indirect
- Automated blanket P.O. releases to suppliers - Direct
- Automated blanket P.O. releases to suppliers - Indirect

0% 25% 50% 75% 100%

- State of Ohio
- Top Performers

The Hackett Group
February 13, 2008
Receipt Processing Cost and Staffing

Receipt Processing Cost as a % of Spend

- State of Ohio: 0.29%
- Comparable Orgs: 0.02%
- World-Class: 0.02%

Receipt Processing FTE's per State of Ohio's Spend

- State of Ohio: 103.2
- Comparable Orgs: 8.1
- World-Class: 8.0

Average Fully Loaded Labor Cost Per Receipt Processing FTE ($)

- State of Ohio: $57,412

Cost per Receipt ($)

- State of Ohio: $34.86
- Comparable Orgs: $4.44
- World-Class: $2.51
Sourcing Execution Cost and Staffing

Sourcing Execution Cost as a % of Spend

- State of Ohio: 0.38%
- Comparable Orgs: 0.10%
- World-Class: 0.08%

Cost Savings as a Percent of Spend

- State of Ohio: 4.5%
- Comparable Orgs: 4.4%
- World-Class: 0.1%

Sourcing Execution FTE's per State of Ohio's Spend

- State of Ohio: 105.8
- Comparable Orgs: 25.5
- World-Class: 18.2

Number of Suppliers

- State of Ohio: 16,260
- Comparable Orgs: 9,927
- World-Class: 9,735
Sourcing Execution Practices

- Percentage spend represented by RFX's created - Indirect
- RFXs submitted electronically – Indirect
- Percentage of spend represented by contracts created - Indirect
- Extent to which procurement measures the total cost of ownership and acquisition

New Question – Small Sample Size

The Hackett Group
February 13, 2008
Procurement Cost And Allocation Summary

**Procurement FTEs per Billion of Spend**
- State of Ohio: $85,302
- Comparable Orgs: $70,788
- World-Class: $70,061

**Procurement Resource Allocation**
- Operations: 68%
- Sourcing and Supply Base Management: 46%
- Planning and Strategy: 35%
- Mgmt and Administration: 49%
- State of Ohio: 23%
- Comparable Orgs: 9%
- World-Class: 9%

**Staff Mix**
- World-Class: 19% Manager, 63% Professional, 19% Clerical
- Peer Group: 20% Manager, 63% Professional, 17% Clerical
- State of Ohio: 32% Manager, 22% Professional, 46% Clerical

The Hackett Group
February 13, 2008
Procurement FTEs by Process

Operations FTEs

340.4 FTEs

164.6

PO Processing

1.7

Scheduling

37.8

Supply Data Mgmt.

103.1

Receipt Processing

32.8

Compliance Mgmt.

105.8

Sourcing Execution

10.1

Supplier Mgmt.

0.6

Product Dev. Support

31.7

Customer Mgmt.

24.5

Sourcing Strategy

16.7

Function Mgmt.
Direct and Indirect Spend Details

Total Direct Spend - $0.14 Billion

- Purchased Finished Goods (Resale)
  - $329,213,932, 17%
  - $18,716,147, 1%
- Raw Materials, Packaging, Other
  - $364,083,120, 19%
- Direct Services
  - $416,716,867, 22%
- General Equipment & Supplies
  - $418,668,946, 22%
- Sales & Marketing Support
  - $49,804,899, 3%
- IT & Telecommunications
  - $50,000, 0.04%
- Business & Administrative Services
  - $298,951,956, 16%
- Capital Equipment/Facilities Operations
  - $30,584,512, 22.21%
- Total Direct Spend - $0.14 Billion

Total Indirect Spend - $1.9 Billion

- Purchased Finished Goods (Resale)
  - $107,054,930, 77.75%
- Raw Materials, Packaging, Other
  - $329,213,932, 17%
- Direct Services
  - $18,716,147, 1%
- General Equipment & Supplies
  - $416,716,867, 22%
- Sales & Marketing Support
  - $49,804,899, 3%
- IT & Telecommunications
  - $364,083,120, 19%
- Business & Administrative Services
  - $298,951,956, 16%
- Capital Equipment/Facilities Operations
  - $418,668,946, 22%
- Total Indirect Spend - $1.9 Billion

Note: Spend does not include interaffiliate spend

Reporting Locations:
- ASD
- Central Services
- OBM
- OSS
- Parks
- Soil and Water

The Hackett Group
February 13, 2008
**Procurement Cost as a Percentage of Spend by Quartile**

### Procurement Cost as a % of Spend*

<table>
<thead>
<tr>
<th>Category</th>
<th>Procurement Cost as a % of Spend</th>
</tr>
</thead>
<tbody>
<tr>
<td>State of Ohio</td>
<td>1.99%</td>
</tr>
<tr>
<td>Comparable Orgs</td>
<td>0.62%</td>
</tr>
<tr>
<td>World-Class</td>
<td>0.63%</td>
</tr>
</tbody>
</table>

* Above comparisons exclude the investment in Customer Management as it is a new Hackett Procurement benchmark process and comparisons are not available at this time.
### State of Ohio’s Procurement Cost Differences To Comparable Org and World-Class

#### Procurement Cost Differences (in $)

<table>
<thead>
<tr>
<th>Procurement Processes</th>
<th>State of Ohio’s Costs (in Millions)</th>
<th>State of OH’s Gap to Comparable Orgs (in Millions)</th>
<th>State of Ohio’s Gap to World-Class (in Millions)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Supply Data Management</td>
<td>2.7</td>
<td>2.3</td>
<td>2.4</td>
</tr>
<tr>
<td>Requisition and PO Processing</td>
<td>11.8</td>
<td>10.4</td>
<td>10.3</td>
</tr>
<tr>
<td>Supplier Scheduling</td>
<td>0.1</td>
<td>(0.4)</td>
<td>(0.2)</td>
</tr>
<tr>
<td>Receipt Processing</td>
<td>5.9</td>
<td>5.6</td>
<td>5.6</td>
</tr>
<tr>
<td>Compliance Management</td>
<td>2.6</td>
<td>1.7</td>
<td>1.9</td>
</tr>
<tr>
<td>Sourcing Execution</td>
<td>7.8</td>
<td>5.7</td>
<td>6.2</td>
</tr>
<tr>
<td>Supplier Management and Development</td>
<td>0.8</td>
<td>(0.2)</td>
<td>(0.6)</td>
</tr>
<tr>
<td>Customer Management</td>
<td>2.5</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Product Development and Design Support</td>
<td>0.1</td>
<td>(0.3)</td>
<td>(0.3)</td>
</tr>
<tr>
<td>Sourcing Strategy and Analysis</td>
<td>1.5</td>
<td>0.4</td>
<td>0.3</td>
</tr>
<tr>
<td>Management and Administration</td>
<td>1.6</td>
<td>0.3</td>
<td>0.6</td>
</tr>
<tr>
<td>Total Process Costs</td>
<td>37.5</td>
<td>25.5</td>
<td>26.2</td>
</tr>
<tr>
<td>Technology Cost</td>
<td>3.5</td>
<td>1.0</td>
<td>1.0</td>
</tr>
<tr>
<td>Other Cost</td>
<td>2.1</td>
<td>0.2</td>
<td>0.5</td>
</tr>
<tr>
<td>Total Procurement Cost</td>
<td>43.1</td>
<td>26.7</td>
<td>27.7</td>
</tr>
</tbody>
</table>

#### Comments

- **Cost Differences**: The cost differences shown are mathematical calculations intended to give an understanding of processes with potential for performance improvement. Areas of focus and actual performance improvement targets should be developed only after considering issues such as organizational structure, business requirements, regulatory requirements, investments required and other factors.
Procurement Resource Allocation

FTE Allocation by Process Groups

- Operations: 49%
  - State of Ohio: 46%
  - Comparable Orgs: 46%
  - World-Class: 49%

- Sourcing and Supply Base Management: 35%
  - State of Ohio: 23%
  - Comparable Orgs: 35%
  - World-Class: 35%

- Planning and Strategy: 9%
  - State of Ohio: 9%
  - Comparable Orgs: 9%
  - World-Class: 9%

- Mgmt and Administration: 7%
  - State of Ohio: 3%
  - Comparable Orgs: 10%
  - World-Class: 10%

Procurement Resource Allocation

- Operations: 340.4
  - Sourcing and Supply: 116.7
    - Base Mgmt: 58.6
    - Planning and Strategy: 44.4
    - Mgmt and Administration: 3.4
- Planning and Strategy: 24.5
- Mgmt and Administration: 16.7
Formal Business Experience and Turnover of the Procurement Staff

Advanced Business Degrees

- Managers:
  - State of Ohio: 48%
  - Comparable Orgs: 63%
  - World-Class: 61%

- Professionals:
  - State of Ohio: 7%
  - Comparable Orgs: 11%
  - World-Class: 19%

Turnover

- State of Ohio: 1%
- Comparable Orgs: 11%
- World-Class: 16%
Overall Spend Management Metrics

**Percent of Procurement’s Influence Over Spend**

- Direct Materials: 28% to 85%
- Indirect Materials: 56% to 95%
- Direct Services: 27% to 83%
- Indirect Services: 50% to 73%

**Cost Reduction and Cost Avoidance Savings as a Percentage of Total Spend**

- State of Ohio: 6.7%
- Comparable Orgs: 6.9%
- World-Class: 81%

**Return on Investment**

- (Procurement Total Operating Cost)
  - 0.02% to 6.7%

**Suppliers per State of Ohio’s Spend**

- State of Ohio: 16,260
- Comparable Orgs: 9,927
- World-Class: 9,735
Cost as a Percentage of Spend by Process

Procurement Process Cost as a % of Spend

- Requisition and PO Processing: 0.58%
- Supplier Scheduling: 0.14%
- Supply Data Management: 0.29%
- Receipt Processing: 0.13%
- Compliance Management: 0.36%
- Sourcing Execution: 0.10%
- Supplier Management and Development: 0.08%
- Product Development and Design Support: 0.02%
- Sourcing and Supply Base Strategy: 0.06%
- Function Management: 0.07%

Legend:
- State of Ohio
- Comparable Orgs
- World-Class
Staffing Comparisons

Procurement FTEs per State of Ohio’s Spend

- Requisition and PO Processing: 164.8
- Supplier Scheduling: 22.8
- Supply Data Management: 19.9
- Receipt Processing: 8.5
- Compliance Management: 7.1
- Sourcing Execution: 8.4
- Supplier Management and Development: 6.6
- Product Development and Design Support: 8.1
- Sourcing and Supply Base Strategy: 10.9
- Function Management: 10.3
- Staffing Comparisons: 10.3
- Comparable Orgs: 10.3
- World-Class: 10.3

The Hackett Group
February 13, 2008
Procurement Technology Cost as a Percentage of Spend and Technology Cost per FTE

Technology Cost as a % of Spend

<table>
<thead>
<tr>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
</table>
| 0.17%         | 0.12%           | 0.12%       

Technology Cost ($) per FTE

<table>
<thead>
<tr>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
</table>
| 6,980         | 14,585           | 24,649      

Comments

- **Technology**: Top performing companies typically have higher technology cost as a % of spend and higher technology cost per FTE, with lower actual FTE counts particularly in the transactional processes.
- Technology costs include hardware, software, depreciation, networking, telecommunications and support costs related to the in scope Procurement processes.
- Technology Cost will vary based upon the age of the applications and the stage of the investment cycle.
### Transaction Automation

#### Procurement Process Cost to Technology Cost Ratio

<table>
<thead>
<tr>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>10.0</td>
<td>3.8</td>
<td>3.6</td>
</tr>
</tbody>
</table>

#### Technology Cost as a Percent of Total Cost

<table>
<thead>
<tr>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>8.6%</td>
<td>18.0%</td>
<td>19.0%</td>
</tr>
</tbody>
</table>

#### Percent of Automated Transactions

<table>
<thead>
<tr>
<th>Process</th>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>Top Performers</th>
</tr>
</thead>
<tbody>
<tr>
<td>On-line approvals - Direct</td>
<td>64.4%</td>
<td>85.9%</td>
<td>88.1%</td>
</tr>
<tr>
<td>On-line approvals - Indirect</td>
<td>74.5%</td>
<td>82.6%</td>
<td>89.5%</td>
</tr>
<tr>
<td>On-line requisitioning - Direct</td>
<td>18.0%</td>
<td>51.2%</td>
<td>32.5%</td>
</tr>
<tr>
<td>On-line requisitioning - Indirect</td>
<td>25.4%</td>
<td>19.4%</td>
<td>32.5%</td>
</tr>
<tr>
<td>Electronic dissemination of POs to suppliers - Direct</td>
<td>85.9%</td>
<td>82.6%</td>
<td>89.5%</td>
</tr>
<tr>
<td>Electronic dissemination of POs to suppliers - Indirect</td>
<td>18.0%</td>
<td>51.2%</td>
<td>32.5%</td>
</tr>
</tbody>
</table>
### State of Ohio’s FTEs at Comparable Org Group and World-Class

<table>
<thead>
<tr>
<th>Procurement Processes</th>
<th>State of Ohio’s FTEs</th>
<th>State of Ohio’s FTEs at Peer Group</th>
<th>State of Ohio’s FTEs at World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Supply Data Management</td>
<td>37.8</td>
<td>8.4</td>
<td>6.5</td>
</tr>
<tr>
<td>Requisition and PO Processing</td>
<td>164.6</td>
<td>22.7</td>
<td>19.8</td>
</tr>
<tr>
<td>Supplier Scheduling</td>
<td>1.7</td>
<td>1.7</td>
<td>1.7</td>
</tr>
<tr>
<td>Receipt Processing</td>
<td>103.1</td>
<td>8.0</td>
<td>8.0</td>
</tr>
<tr>
<td>Compliance Management</td>
<td>32.8</td>
<td>10.8</td>
<td>7.0</td>
</tr>
<tr>
<td>Sourcing Execution</td>
<td>105.8</td>
<td>25.4</td>
<td>18.2</td>
</tr>
<tr>
<td>Supplier Management and Development</td>
<td>10.1</td>
<td>10.1</td>
<td>10.1</td>
</tr>
<tr>
<td>Customer Management</td>
<td>31.7</td>
<td>31.7</td>
<td>31.7</td>
</tr>
<tr>
<td>Product Development and Design Support</td>
<td>0.6</td>
<td>0.6</td>
<td>0.6</td>
</tr>
<tr>
<td>Sourcing Strategy and Analysis</td>
<td>24.5</td>
<td>11.2</td>
<td>9.0</td>
</tr>
<tr>
<td>Management and Administration</td>
<td>16.7</td>
<td>13.1</td>
<td>7.4</td>
</tr>
<tr>
<td><strong>Total Procurement FTEs</strong></td>
<td><strong>529.2</strong></td>
<td><strong>143.7</strong></td>
<td><strong>120.1</strong></td>
</tr>
</tbody>
</table>
PO Processing Cost and Staffing

**PO Processing Cost as a % of Spend**
- State of Ohio: 0.58%
- Comparable Orgs: 0.07%
- World-Class: 0.07%

**PO Processing FTE's per State of Ohio's Spend**
- State of Ohio: 164.8
- Comparable Orgs: 22.8
- World-Class: 19.9

**Average Fully Loaded Labor Cost Per PO Processing FTE ($)**
- State of Ohio: $71,382

**Cost per Purchase Order ($)**
- State of Ohio: $77.46
  - Comparable Orgs: $10.27
  - World-Class: $8.04
Requisition and Purchase Order Processing Practices

Cycle Time (Hours)
Comparisons not available

<table>
<thead>
<tr>
<th>Type</th>
<th>Cycle Time (Hours)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Catalog-based Purchases</td>
<td>29</td>
</tr>
<tr>
<td>Ad-hoc-based Purchases</td>
<td>42</td>
</tr>
</tbody>
</table>

Average Line Items per Purchase Order

<table>
<thead>
<tr>
<th>Type</th>
<th>Average Line Items</th>
</tr>
</thead>
<tbody>
<tr>
<td>Catalog-based Purchases</td>
<td>2.7</td>
</tr>
<tr>
<td>Ad-hoc-based Purchases</td>
<td>2.7</td>
</tr>
</tbody>
</table>
Requisition and Purchase Order Processing Practices (Cont’d)

- Percentage of requisitioners with electronic procurement access
- Automated approval generation of P.O.’s from electronic requisitions - Indirect
- Automated dissemination of P.O.’s to suppliers - Direct
- Automated dissemination of P.O.’s to suppliers - Indirect
- Automated blanket P.O. releases to suppliers - Direct
- Automated blanket P.O. releases to suppliers - Indirect

State of Ohio Procurement Rapid Benchmark Report

The Hackett Group
February 13, 2008
Scheduling Cost And Staffing

Scheduling Cost as a % of Spend

<table>
<thead>
<tr>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>0.01%</td>
<td>0.02%</td>
<td></td>
</tr>
</tbody>
</table>

Average Fully Loaded Labor Cost Per Scheduling FTE ($)

- State of Ohio: $62,758

Scheduling FTE's per State of Ohio's Spend

- State of Ohio: 1.8
- Comparable Orgs: 8.5
- World-Class: 7.1

Inventory Value Controlled Under Supplier Managed Inventory Programs

- State of Ohio: 0%
- Comparable Orgs: 7%
- World-Class: 15%
Supplier Scheduling Practices

0% 25% 50% 75% 100%

Percent of order acknowledgements are received back in an electronic format

Percent of deliveries are late compared to scheduled arrival date – Indirect

Line item fill rate percentage

New Question – Small Sample Size

- State of Ohio
- Top Performers
Supplier Scheduling Practices (Cont’d)

- Manufacturing planners and supplier schedulers communicate real time with adjustments in manufacturing schedule
- Changes to customer production planning automatically generates supplier notification
- Forecast accuracy is measured to improve the forecasting process
- A single forecast drives the planning systems and financial estimates
- Accuracy of direct material production forecasts

Accuracy of direct material production forecasts

| State of Ohio | None | Low | Medium | High |

New Question – Small Sample Size
New Question – Small Sample Size
New Question – Small Sample Size
New Question – Small Sample Size
New Question – Small Sample Size
## Receipt Processing Cost and Staffing

<table>
<thead>
<tr>
<th>Receipt Processing Cost as a % of Spend</th>
<th>Receipt Processing FTE's per State of Ohio's Spend</th>
</tr>
</thead>
<tbody>
<tr>
<td>0.29%</td>
<td>103.2</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Average Fully Loaded Labor Cost Per Receipt Processing FTE ($)</th>
<th>Cost per Receipt ($)</th>
</tr>
</thead>
<tbody>
<tr>
<td>$57,412</td>
<td>$34.86</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>8.1</td>
<td>8.0</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>$4.44</td>
<td>$2.51</td>
<td></td>
</tr>
</tbody>
</table>
Supply Data Management Cost and Staffing

- Supply Data Management Cost as a % of Spend
  - State of Ohio: 0.14%
  - Comparable Orgs: 0.02%
  - World-Class: 0.02%

- Supply Data Management FTE’s per State of Ohio’s Spend
  - State of Ohio: 37.8
  - Comparable Orgs: 8.4
  - World-Class: 6.6

- Average Fully Loaded Labor Cost Per Supply Data Management FTE ($)
  - State of Ohio: $72,292

- Supply Data Management Process Cost per Item Master File/Supplier Master File Update ($)
  - State of Ohio: $192.74
  - Comparable Orgs: $18.33
  - World-Class: $15.07
Supply Data Management Practices

- Utilization of a enterprise wide supplier master file
- Required data elements associated with each contract that is made
- Standard procedures for contract master management
- Utilization of a enterprise wide item master file
- Standard process for supplier master file maintenance (add, edits, deletes)
- Utilization of standard supplier naming conventions
- Utilization of a enterprise wide expenditure coding scheme
- Utilization of an enterprise-wide catalog for catalogable indirect spend
- Standard process for item master file maintenance (add, edits, deletes)
- Ability to compare and analyze the performance and terms of contracts

<table>
<thead>
<tr>
<th>Not a part of</th>
<th>Sometimes a part</th>
<th>Often a part</th>
<th>Always a part</th>
</tr>
</thead>
<tbody>
<tr>
<td>State of Ohio</td>
<td>Top Performers</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Compliance Management Cost and Staffing

Compliance Management Cost as a % of Spend
- State of Ohio: 0.13%
- Comparable Orgs: 0.04%
- World-Class: 0.04%

Average Fully Loaded Labor Cost Per Compliance Management FTE ($)
- State of Ohio: $77,800

Compliance Management FTE’s per State of Ohio’s Spend
- State of Ohio: 32.9
- Comparable Orgs: 10.9
- World-Class: 7.1

Extent to Which One Standard Set of Procedures Followed by All Business Units/Divisions/Locations
- Sourcing Strategy and Analysis
- Sourcing Execution
- Requisition and PO Processing
- Supply Data Management
- Supplier Management and Development
Sourcing Execution Cost and Staffing

**Sourcing Execution Cost as a % of Spend**
- State of Ohio: 0.38%
- Comparable Orgs: 0.10%
- World-Class: 0.08%

**Cost Savings as a Percent of Spend**
- State of Ohio: 4.5%
- Comparable Orgs: 4.4%
- World-Class: 0.1%

**Sourcing Execution FTE's per State of Ohio's Spend**
- State of Ohio: 105.8
- Comparable Orgs: 25.5
- World-Class: 18.2

**Number of Suppliers**
- State of Ohio: 16,260
- Comparable Orgs: 9,927
- World-Class: 9,735
Sourcing Execution Practices

- Percentage spend represented by RFXs created - Indirect
- RFXs submitted electronically – Indirect
- Percentage of spend represented by contracts created - Indirect
- Extent to which procurement measures the total cost of ownership and acquisition

New Question – Small Sample Size

State of Ohio

Top Performers

State of Ohio Procurement Rapid Benchmark Report
Supplier Mgmt. & Development Cost and Staffing

Supplier Mgmt & Development Cost as a % of Spend

- State of Ohio: 0.04%
- Comparable Orgs: 0.05%
- World-Class: 0.07%

Supplier Mgmt & Development FTE's per State of Ohio's Spend

- State of Ohio: 10.3
- Comparable Orgs: 14.7
- World-Class: 12.7

Percentage of Suppliers Providing 80% of Spend Value

- State of Ohio: 24%
- Comparable Orgs: 6%
- World-Class: 5%

Percent of Suppliers with Failing Performance Scores

- State of Ohio: 2%
- Comparable Orgs: 6%
- World-Class: 14%
Performance Measurement

Percentage of Spend where Performance Measures are Maintained

- Indirect, Capital Equipment/Facilities Operations: 25%
- Indirect, IT & Telecommunications: 16%
- Indirect, General Equipment & Supplies: 22%
- Indirect, Sales & Marketing Support: 16%
- Indirect, General Equipment & Supplies: 32%
- Indirect, Travel & Entertainment: 30%
- Indirect, Human Resource Services: 38%
Percentage of Suppliers not Meeting Established Performance Levels

- **Indirect, Capital Equipment/Facilities Operations**: 1.88%
- **Indirect, IT & Telecommunications**: 0.86%
- **Indirect, General Equipment & Supplies**: 0.43%
- **Indirect, Sales & Marketing Support**: 0.14%
- **Indirect, Travel & Entertainment**: 0.14%
- **Indirect, Human Resource Services**: 0.43%
- **Indirect, Administrative & Business Services**: 0.29%
Procurement Involvement in Supplier Management

- Indirect, Administrative & Business Services
- Indirect, HR Services
- Indirect, Travel & Entertainment
- Indirect, General Equipment & Supplies
- Indirect, Sales & Marketing Support
- Indirect, IT & Telecommunications
- Indirect, Capital Equipment/Facilities Operations

The Hackett Group
February 13, 2008
Sourcing Strategy Cost and Staffing

Sourcing Strategy Cost as a % of Spend

- State of Ohio: 0.08%
- Comparable Orgs: 0.06%
- World-Class: 0.06%

Sourcing Strategy FTE’s per State of Ohio’s Spend

- State of Ohio: 24.5
- Comparable Orgs: 11.2
- World-Class: 9.1

Level of Spend Data Visibility

- Global: Significant
- Regional: Significant
- Divisional: Significant

Percent of Analyst Time Spent Compiling Data vs. Performing Analysis

- Top Performers: Collecting and compiling data: 42%, Performing analysis: 58%
- Peer Group: Collecting and compiling data: 43%, Performing analysis: 57%
- State of Ohio: Collecting and compiling data: 26%, Performing analysis: 74%
Sourcing Strategy and Analysis Best Practices

- Extent comprehensive analytical reporting tools are utilized to perform spend analysis
- Extent to which procurement data is available and/or accessible to individuals who need it
- Extent to which procurement data is accurate and reliable
- Extent total spend is covered by formal and documented sourcing strategies
- Utilization of cross functional teaming to support sourcing strategy development

State of Ohio Top Performers

- New Question – Small Sample Size
- New Question – Small Sample Size

State of Ohio
- Low
- High
Top Performers
- Medium
- High
Percentage of Spend with Formal / Documented Sourcing Strategies

Percentage of Spend With Formal Sourcing Strategies

- Indirect, Capital Equipment/Facilities Operations: 44%
- Indirect, IT & Telecommunications: 52%
- Indirect, General Equipment & Supplies: 18%
- Indirect, Travel & Entertainment: 50%
- Indirect, Human Resource Services: 51%
- Indirect, Sales & Marketing Support: 48%
- Indirect, Administrative & Business Services: 25%

The Hackett Group
February 13, 2008
Function Management Cost and Staffing

Function Management Cost as a % of Spend

- State of Ohio: 0.08%
- Comparable Orgs: 0.07%
- World-Class: 0.05%

Function Management FTE's per State of Ohio's Spend

- State of Ohio: 16.7
- Comparable Orgs: 13.1
- World-Class: 7.4

Overall Span of Control
Number of Supervisory Roles to all Others

- State of Ohio: 2.1
- Comparable Orgs: 4.0
- World-Class: 4.3
Table of Contents

Section One
  – Sponsor’s Letter

Section Two
  – Executive Summary

Section Three
  – Appendix
    – Section One
    – Introduction
    – Section Two
    – Financial Rapid Benchmark Report
    – Section Three
    – Technology Rapid Benchmark Report
    – Section Four
    – Procurement Rapid Benchmark Report
    – Section Five
    – Human Resources Rapid Benchmark Report
    – Section Six
    – Achieving World-Class Performance
    – Section Seven
    – About The Hackett Group
Efficiency and Effectiveness Ranking as Calculated by The Hackett Group’s Human Resources Value Grid

- Human Resources costs for the in scope processes were $142.4 million
  - Total Human Resources cost of $142.4m equates to $2,650 per employee (3rd quartile)
  - Higher staffing levels and outsourcing costs
  - Lower fully-loaded labor rates in comparison
  - 93% focus on Employee Life Cycle and Transactional processing
  - 48% of staff classified as Professional

- Human Resources scores third quartile on the Hackett Value Grid for efficiency
  - Low efficiency plotting on the value grid due to high total and transaction processing costs, higher FTEs and cycle times and minimal technology leverage

- Human Resources scores third quartile on the Hackett Value Grid for effectiveness:
  - Low effectiveness plotting attributed to Human Resources role, quality, value of analysis and organizational talent management
Human Resource Demographics Comparison – Ohio and the Large Diverse Organization Slice of the Hackett Database

- **Employees**
  - < 4K
  - 4K – 10K
  - 10K – 20K
  - 20K – 45K
  - > 45K

- **Countries**
  - One
  - 2 - 4
  - 5 - 20
  - 21 - 45
  - > 45

- **Operating locations**
  - < 20
  - 31 - 50
  - 51 - 125
  - 125 - 300
  - > 300

- **Retirees**
  - None
  - 1 – 1K
  - 1K – 2.5K
  - 2.5K – 10K
  - > 10K

- **Seasonal employees**
  - None
  - 1 – 10
  - 10 – 100
  - 100 – 500
  - > 500

△ State of Ohio  ▶ Comparable Org Median  ● World-Class range
Human Resource Participants in the Large Diverse Organization Slice of the Hackett Database

- Alcoa, Inc.
- American Express Company
- Bayer AG
- Bombardier Transportation GmbH
- British Telecommunications plc
- Caterpillar, Inc.
- Chevron Texaco Corporation
- Citigroup Inc.
- ConAgra Foods, Inc.
- ConocoPhillips
- Dana Corporation
- E.I. du Pont de Nemours and Company
- Eaton Corporation
- General Electric Company
- Georgia-Pacific Corporation
- Halifax Plc
- Heineken N.V.
- Henkel KGaA
- Honeywell International Inc.
- Kimberly-Clark Corporation
- Lucent Technologies Inc.
- Marriott International, Inc.
- Motorola, Inc.
- Philip Morris USA Inc.
- Renault S.A.
- Statoil ASA
- Unilever Best Foods – Latin America
- United States Steel
Data was Collected in Accordance With Hackett’s Human Resources Taxonomy

<table>
<thead>
<tr>
<th>Transactional</th>
<th>Employee Life Cycle</th>
<th>Planning and Strategy</th>
<th>Management and Administration</th>
</tr>
</thead>
<tbody>
<tr>
<td>▪ Total Rewards Administration</td>
<td>▪ Staffing Services</td>
<td>▪ Total Rewards Planning</td>
<td>▪ Function Management</td>
</tr>
<tr>
<td>▪ Payroll Administration</td>
<td>▪ Recruiting and Staffing</td>
<td>▪ Strategic Workforce Planning</td>
<td></td>
</tr>
<tr>
<td>▪ Time &amp; Attendance</td>
<td>▪ Exit Process</td>
<td></td>
<td></td>
</tr>
<tr>
<td>▪ Data Management, Reporting &amp; Compliance</td>
<td>▪ Workforce Development Services</td>
<td></td>
<td></td>
</tr>
<tr>
<td>▪ Employee Data Management and HR Reporting</td>
<td>▪ Organizational Effectiveness Services</td>
<td></td>
<td></td>
</tr>
<tr>
<td>▪ Compliance Management</td>
<td>▪ Labor Relations</td>
<td></td>
<td></td>
</tr>
<tr>
<td>▪ Health &amp; Welfare Administration</td>
<td>▪ Organization Design and Development</td>
<td></td>
<td></td>
</tr>
<tr>
<td>▪ Pension &amp; Savings Administration</td>
<td>▪ Employee Relations</td>
<td></td>
<td></td>
</tr>
<tr>
<td>▪ Compensation Administration</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>▪ Function Management</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
State of Ohio’s Baseline Human Resources Cost

Total Human Resources Cost
$142.4 Million

Other cost – $7.3 Million
- Facilities & Overhead
- Travel
- Training
- Other (Supplies, subscriptions, etc.)

Technology cost – $6.1 Million
- Computer processing
- Maintenance

Outsourcing cost – $45 Million
- Outside services

Labor cost – $84 Million
- Wages (full-time and part-time)
- Overtime and bonuses
- Taxes and fringe benefits

Total employees = 53,751
State of Ohio’s Volumes Related to the Large Diverse Organizations

Human Resources Transaction Volumes

- Paychecks (in thousands): State of Ohio 1,272, Comparable Org 1,212
- Hires: State of Ohio 7,858, Comparable Org 6,353
- Voluntary Terminations: State of Ohio 1,491, Comparable Org 1,212
- Involuntary Terminations: State of Ohio 2,713, Comparable Org 545
- Compliance Audits: State of Ohio 1,700, Comparable Org 72
- Standard Reports: State of Ohio 780, Comparable Org 73
- Ad Hoc Reports: State of Ohio 1,159, Comparable Org 776
Resource Allocation and Staff Mix

Resource Allocation

- Transational: 45%
- Employee Life Cycle: 25%
- Management and Administration: 27%
- Planning and Strategy: 2%

Staff Mix

- Manager: 27%
- Professional: 48%
- Clerical: 25%
Efficiency and Effectiveness Ranking as Calculated by The Hackett Group’s Human Resources Value Grid

Value Grid: Effectiveness is rated on the vertical scale. Effectiveness is based on Human Resources practices related to partnering, information delivery, analysis, quality, talent management and economic return. Efficiency is rated on the horizontal scale. Efficiency is not purely cost; it reflects costs, automation, cycle times and technology leverage.

<table>
<thead>
<tr>
<th>Key Human Resources Drivers</th>
<th>State of Ohio</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total cost</td>
<td>🟥</td>
</tr>
<tr>
<td>Transaction Processing Cost</td>
<td>🟥</td>
</tr>
<tr>
<td>FTEs &amp; Productivity</td>
<td>🟥</td>
</tr>
<tr>
<td>Cycle Time</td>
<td>🟥</td>
</tr>
<tr>
<td>Technology Leverage</td>
<td>🟥</td>
</tr>
<tr>
<td>Role of HR</td>
<td>🟥</td>
</tr>
<tr>
<td>Talent Management</td>
<td>🟥</td>
</tr>
<tr>
<td>Value of Analysis</td>
<td>🟥</td>
</tr>
<tr>
<td>Quality</td>
<td>🟥</td>
</tr>
<tr>
<td>Economic Return</td>
<td>🟥</td>
</tr>
<tr>
<td>Organizational Talent</td>
<td>🟥</td>
</tr>
</tbody>
</table>

Most KPIs for the Key Driver are at or near World-Class
Some KPIs for the Key Driver are at or near World-Class
Most KPIs for the Key Driver are far from World-Class
State of Ohio’s Human Resources Costs are Driven by Staffing and Outsourcing

Total Human Resources Cost
- $142.4 Million

- 59% Labor
- 5% Outsourcing
- 32% Technology
- 4% Other

<table>
<thead>
<tr>
<th>Employees</th>
<th>53,751</th>
</tr>
</thead>
<tbody>
<tr>
<td>Labor</td>
<td>$84.0 million</td>
</tr>
<tr>
<td>Outsourcing</td>
<td>$45.0 million</td>
</tr>
<tr>
<td>Technology</td>
<td>$6.1 million</td>
</tr>
<tr>
<td>Other</td>
<td>$7.3 million</td>
</tr>
</tbody>
</table>

Human Resources Cost ($) per Employee
- State of Ohio
  - Labor: $337
  - Outsourcing: $1,563
  - Technology: $1.5 million
  - Other: $1.121

- Comparable Orgs
  - Labor: $275
  - Outsourcing: $1,892
  - Technology: $1.822
  - Other: $1.022

- World-Class
  - Labor: $271
  - Outsourcing: $293
  - Technology: $230
  - Other: $209

FTE Allocation
- State of Ohio
  - Transactional: 55.9
  - Employee Life Cycle: 52.1
  - Planning and Strategy: 546.7
  - Management and Administration: 301.5

- Comparable Orgs
  - Transactional: 62.2
  - Employee Life Cycle: 62.4
  - Planning and Strategy: 312.4
  - Management and Administration: 301.9

- World-Class
  - Transactional: 62.9
  - Employee Life Cycle: 62.8
  - Planning and Strategy: 301.9
  - Management and Administration: 200.9

The Hackett Group
February 13, 2008
Overall Costs are Higher Despite Lower Investment in Technology and Employee Compensation

Technology Cost ($ per Employee)

<table>
<thead>
<tr>
<th>Allocation</th>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Transactional</td>
<td>48%</td>
<td>41%</td>
<td>32%</td>
</tr>
<tr>
<td>Employee Life Cycle</td>
<td>45%</td>
<td>42%</td>
<td>49%</td>
</tr>
<tr>
<td>Planning &amp; Strategy</td>
<td>2%</td>
<td>9%</td>
<td>10%</td>
</tr>
<tr>
<td>Mgt &amp; Admin</td>
<td>5%</td>
<td>8%</td>
<td>9%</td>
</tr>
</tbody>
</table>

Technology Cost ($ per Human Resources FTE)

Average Fully Loaded Labor Cost

($ per FTE per year)
# Human Resources Cost Differences to Comparable Orgs and to World-Class

## Human Resources Cost Differences (in $)

<table>
<thead>
<tr>
<th>HR Processes</th>
<th>State of Ohio's Costs (in Millions)</th>
<th>State of Ohio's Gap to Peer (in Millions)</th>
<th>State of Ohio's Gap to World-Class (in Millions)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total Rewards Administration</td>
<td>47.5</td>
<td>36.2</td>
<td>31.8</td>
</tr>
<tr>
<td>Time and Attendance</td>
<td>8.3</td>
<td>6.0</td>
<td>7.7</td>
</tr>
<tr>
<td>Payroll Administration</td>
<td>9.0</td>
<td>3.8</td>
<td>5.1</td>
</tr>
<tr>
<td>Data Management, Reporting and Compliance</td>
<td>14.2</td>
<td>6.5</td>
<td>8.6</td>
</tr>
<tr>
<td>Staffing Services</td>
<td>12.4</td>
<td>1.9</td>
<td>3.9</td>
</tr>
<tr>
<td>Workforce Development</td>
<td>13.0</td>
<td>2.2</td>
<td>1.8</td>
</tr>
<tr>
<td>Labor Relations</td>
<td>10.2</td>
<td>5.9</td>
<td>8.3</td>
</tr>
<tr>
<td>Organizational Effectiveness</td>
<td>7.2</td>
<td>(2.3)</td>
<td>(1.7)</td>
</tr>
<tr>
<td>Total Rewards Planning</td>
<td>0.7</td>
<td>(3.5)</td>
<td>(2.9)</td>
</tr>
<tr>
<td>Strategic Workforce Planning</td>
<td>1.7</td>
<td>(1.9)</td>
<td>(2.9)</td>
</tr>
<tr>
<td>Function Management</td>
<td>4.9</td>
<td>(2.6)</td>
<td>(1.6)</td>
</tr>
<tr>
<td>Total Process Costs</td>
<td>129.0</td>
<td>52.1</td>
<td>58.0</td>
</tr>
<tr>
<td>Technology Cost</td>
<td>6.1</td>
<td>(3.9)</td>
<td>(8.5)</td>
</tr>
<tr>
<td>Other Cost</td>
<td>7.3</td>
<td>(7.5)</td>
<td>(5.0)</td>
</tr>
<tr>
<td>Total HR Cost</td>
<td>142.4</td>
<td>40.7</td>
<td>44.5</td>
</tr>
</tbody>
</table>

- **Cost Differences:** The cost differences shown are mathematical calculations intended to give an understanding of processes with potential for performance improvement. Areas of focus and actual performance improvement targets should be developed only after considering issues such as organizational structure, business requirements, regulatory requirements, investments required and other factors.
Transaction Processing Costs and Staffing Levels

- **Process Cost per Employee ($)**
  - State of Ohio: $1,470
  - Comparable Orgs: $493
  - World-Class: $481

- **Transaction Processing FTEs per State of Ohio’s Employees**
  - State of Ohio: 546.7
  - Comparable Orgs: 301.5
  - World-Class: 200.9

- **Total Rewards Administration**
  - Health & Welfare Administration
  - Pension & Savings Administration
  - Compensation Administration

- **Payroll Administration**

- **Time & Attendance**

- **Data Management, Reporting & Compliance**
  - Employee Data Management and Human Resources Reporting
  - Compliance Management
Cost per Transaction Process

Total Rewards Administration Cost ($ per Employee

- State of Ohio: $755
  - Labor: $128
  - Outsourcing: $67
- Comparable Orgs: $118
- World-Class: $149

Time & Attendance Cost ($ per Employee

- State of Ohio: $155
  - Labor: $4
  - Outsourcing: $11
- Comparable Orgs: $39
- World-Class: $1

Payroll Administration Cost ($ per Employee

- State of Ohio: $33
  - Labor: $135
  - Outsourcing: $72
- Comparable Orgs: $26
  - Labor: $12
  - Outsourcing: $60
- World-Class: $18

Data Mgmt, Reporting & Compliance Cost ($ per Employee

- State of Ohio: $263
  - Labor: $124
  - Outsourcing: $85
- Comparable Orgs: $18
- World-Class: $19
Staffing per Transaction Process

Total Rewards Administration FTEs per State of Ohio’s Employees

- State of Ohio: 99.4
- Comparable Orgs: 75.4
- World-Class: 69.9

Time & Attendance FTEs per State of Ohio’s Employees

- State of Ohio: 137.9
- Comparable Orgs: 44.4
- World-Class: 9.3

Payroll Administration FTEs per State of Ohio’s Employees

- State of Ohio: 117.7
- Comparable Orgs: 80.2
- World-Class: 55.8

Data Mgmt, Reporting & Compliance FTEs per State of Ohio’s Employees

- State of Ohio: 191.7
- Comparable Orgs: 101.5
- World-Class: 65.9
**Total Rewards Administration Process Summary**

### Total Rewards Administration Cost ($) per Served

<table>
<thead>
<tr>
<th></th>
<th>State of Ohio</th>
<th>Comparable Organizations</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Health &amp; Welfare</td>
<td>0.3</td>
<td>1.9</td>
<td>2.0</td>
</tr>
<tr>
<td>Pension &amp; Savings</td>
<td>0.1</td>
<td>1.1</td>
<td>0.5</td>
</tr>
<tr>
<td>Compensation</td>
<td>0.3</td>
<td>3.9</td>
<td>0.8</td>
</tr>
</tbody>
</table>
Transaction Process Automation and Error Rates

Total Rewards Administration Automation

- Health & Welfare: State of Ohio 50%, Comparable Orgs 21%, Top Performers 7%
- Pension & Savings: State of Ohio 27%, Comparable Orgs 7%, Top Performers 0%
- Compensation: State of Ohio 90%, Comparable Orgs 27%, Top Performers 0%

Error Rates for Transactions

- Health & Welfare: State of Ohio 33%, Comparable Orgs 3%, Top Performers 0%
- Compensation: State of Ohio 4%, Comparable Orgs 3%, Top Performers 1%
- Pension & Savings Plans: State of Ohio 5%, Comparable Orgs 3%, Top Performers 1%

Time & Attendance Automation

- State of Ohio 99%
- Comparable Orgs 44%
- Top Performers 33%

Time & Attendance Error Rate

- State of Ohio 7%
- Comparable Orgs 7%
- Top Performers 0%
Transaction Process Automation and Error Rates Cont’d

Payroll Administration Automation

- State of Ohio: 39%
- Comparable Orgs: 33%
- Top Performers: 95%

Payroll Administration Error Rate

- Pay Adjustment Per Employee: 0.6
- Extent direct deposit distribution is paperless: High
- Extent common database info is shared between Human Resources and Payroll: Medium

Data Management Automation

- State of Ohio: 23%
- Comparable Orgs: 29%
- Top Performers: 61%

Data Management Error Rate

- Time spent collecting/compiling vs. analyzing data (standard reports): Low/Med
- Time spent collecting/compiling vs. analyzing data (adhoc reports): Low/Med
- Extent reports are produced automatically: Low
Employee Life Cycle Costs and Staffing Levels

Process Cost per Employee ($)

<table>
<thead>
<tr>
<th></th>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>$796</td>
<td>$653</td>
<td>$567</td>
<td></td>
</tr>
</tbody>
</table>

Staffing Services
- Recruiting and Staffing
- Exit Process

Workforce Development Services*

Organizational Effectiveness Services
- Labor Relations
- Organization Design and Development
- Employee Relations

*Transferable training only
Cost per Employee Life Cycle Process

Staffing Services Cost ($ per Employee)
- State of Ohio: $227
- Comparable Orgs: $144
- World-Class: $130
- Labor: $3
- Outsourcing: $51

Workforce Development Cost ($ per Employee)
- State of Ohio: $208
- Comparable Orgs: $139
- World-Class: $155
- Labor: $33
- Outsourcing: $62

Organizational Effectiveness Cost ($ per Employee)
- State of Ohio: $148
- Comparable Orgs: $35
- World-Class: $1
- Labor: $16
- Outsourcing: $16

Labor Relations Cost ($ per Employee)
- State of Ohio: $185
- Comparable Orgs: $72
- World-Class: $35
- Labor: $5
- Outsourcing: $8
Staffing per Employee Life Cycle Process

Staffing Services FTEs per State of Ohio’s Employees

- State of Ohio: 173.1
- Comparable Orgs: 92.5
- World-Class: 102.5

Workforce Development FTEs per State of Ohio’s Employees

- State of Ohio: 148.4
- Comparable Orgs: 86.1
- World-Class: 80.1

Organizational Effectiveness FTEs per State of Ohio’s Employees

- State of Ohio: 83.5
- Comparable Orgs: 93.3
- World-Class: 87.7

Labor Relations FTEs per State of Ohio’s Employees

- State of Ohio: 116.9
- Comparable Orgs: 40.6
- World-Class: 31.5
**Automation**

**Staffing Automation**
- State of Ohio: 27%
- Comparable Orgs: 25%
- Top Performers: 80%

**Process Cost ($) per Hire/Placement**
- State of Ohio: $1,952
- Comparable Orgs: $1,336
- Top Performers: $1,255

**Staffing Automation**
- Extent new hire activities are automated
  - State of Ohio: Low
  - Top Performers: Medium
- Percent of time competency profiles utilized
  - State of Ohio: Med/High
  - Top Performers: High

**Workforce Development**
- Extent new skill mentoring and coaching takes place
  - State of Ohio: Low/Medium
  - Top Performers: Medium
- Extent external training is offered for new skills
  - State of Ohio: Medium
  - Top Performers: High
- Extent job rotation is used to increase knowledge
  - State of Ohio: None/Low
  - Top Performers: Medium
Staffing Services Process Statistics

Total Placements/Hires per Staffing FTE

- State of Ohio: 37, 66, 85
- Comparable Orgs: 47, 45, 68
- World-Class: 50, 51, 74

Days to Fill Open Positions

- Manager: State of Ohio 68, Comparable Orgs 61, Top Performers 41%
- Professional: State of Ohio 74, Comparable Orgs 51, Top Performers 36%
- Clerical: State of Ohio 61, Comparable Orgs 28, Top Performers 17%

Terminations per Thousand Employees

- Voluntary: State of Ohio 28, Comparable Orgs 38, World-Class 47
- Involuntary: State of Ohio 10, Comparable Orgs 16, World-Class 50

Internal Placements versus External Hires

- State of Ohio: 41%, Comparable Orgs: 36%, Top Performers: 61%
Labor Relations Process

Unions per Thousand Unionized Employees

Grievances per Thousand Unionized Employees
Strategic Costs and Staffing Levels

**Process Cost per Employee ($)**

- State of Ohio: $44
- Comparable Orgs: $145
- World-Class: $152

**Strategic FTEs per State of Ohio’s FTEs**

- State of Ohio: 63.5
- Comparable Orgs: 62.9
- World-Class: 26.0

- Strategic Workforce Planning
- Total Rewards Planning
Costs per Strategic Process

Strategic Workforce Planning Cost ($) per Employee

- **State of Ohio**: $31
- **Comparable Orgs**: $65
- **World-Class**: $81

Total Rewards Planning Cost ($) per Employee

- **State of Ohio**: $13
- **Comparable Orgs**: $62
- **World-Class**: $55

Strategic Workforce Planning FTEs per State of Ohio’s Employees

- **State of Ohio**: 17.9
- **Comparable Orgs**: 31.8
- **World-Class**: 37.0

Total Rewards Planning FTEs per State of Ohio’s Employees

- **State of Ohio**: 8.1
- **Comparable Orgs**: 31.7
- **World-Class**: 25.9

The Hackett Group
February 13, 2008
Extent strategic workforce plans identify scarce sets of skills and set a strategy for acquiring those skills

Extent key employees have been identified and formal retention plans created for these employees

Extent an explicit workforce strategy has been articulated

Extent there are explicit goals and targets set for compensation plans in terms of service levels, coverage or cost

Extent there are explicit goals and targets set for benefit plans in terms of service levels, coverage or cost

Extent you participate in industry or function surveys regarding benefit plan design

Key Best Practice Utilization Comparisons

State of Ohio

Top Performers

High

Medium

Low

None

Not Applicable to State of Ohio
Human Resources Function Management Process

Human Resources Function Management Cost ($) per Employee

- State of Ohio: $91
- Comparable Orgs: $126
- World-Class: $112

Human Resources Function Management FTEs per State of Ohio’s Employees

- State of Ohio: 55.9
- Comparable Orgs: 62.2
- World-Class: 52.8

The Hackett Group
February 13, 2008
Human Resources Cost per Employee

Human Resources Cost ($ per Employee

State of Ohio
- Labor: $1,563
- Outsourcing: $136
- Technology: $114
- Other: $837

Comparable Orgs
- Labor: $1,892
- Outsourcing: $275
- Technology: $187
- Other: $309

World-Class
- Labor: $1,822
- Outsourcing: $230
- Technology: $271
- Other: $299

Quartile Cost ($ per Employee

Quartile 1
- State of Ohio: $2,650
- World-Class: $1,822

Quartile 2
- State of Ohio: $2,673
- World-Class: $1,892

Quartile 3
- State of Ohio: $2,673
- World-Class: $1,892

Quartile 4
- State of Ohio: $3,594
- World-Class: $2,673
### Human Resources Staffing and Resource Allocation

#### Resource Allocation

<table>
<thead>
<tr>
<th>Category</th>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Transnational</td>
<td>55.9</td>
<td>62.2</td>
<td>52.8</td>
</tr>
<tr>
<td>Planning and Strategy</td>
<td>26.0</td>
<td>63.5</td>
<td>62.9</td>
</tr>
<tr>
<td>Employee Life Cycle</td>
<td>546.7</td>
<td>312.4</td>
<td>301.9</td>
</tr>
<tr>
<td>Management and Administration</td>
<td>521.9</td>
<td>301.5</td>
<td>200.9</td>
</tr>
</tbody>
</table>
Staff Mix, Labor Rates and Spans of Control

Human Resources FTE Staff Mix

<table>
<thead>
<tr>
<th>World-Class</th>
<th>Comparable Orgs</th>
<th>State of Ohio</th>
</tr>
</thead>
<tbody>
<tr>
<td>22%</td>
<td>28%</td>
<td>25%</td>
</tr>
<tr>
<td>53%</td>
<td>46%</td>
<td>49%</td>
</tr>
<tr>
<td>25%</td>
<td>26%</td>
<td>25%</td>
</tr>
</tbody>
</table>

Average Fully Loaded Labor Cost ($ per FTE per year)

<table>
<thead>
<tr>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>$73,014</td>
<td>$81,450</td>
<td>$88,822</td>
</tr>
</tbody>
</table>

Number of Staff to Managers (Span of Control)

<table>
<thead>
<tr>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>3.1</td>
<td>2.6</td>
<td>3.6</td>
</tr>
</tbody>
</table>
Technology Cost per Employee and Cost per Human Resources FTE

Comments

- **Technology**: Top performing companies typically have higher technology cost per employee and higher technology cost per FTE, with lower actual FTE counts particularly in the transactional processes.
- Technology costs include hardware, software, depreciation, networking, telecommunications and support costs related to the in-scope Human Resources processes.
- Technology Cost will vary based upon the age of the applications and the stage of the investment cycle.
## Human Resources Cost Differences to Comparable Org and to World-Class

<table>
<thead>
<tr>
<th>HR Processes</th>
<th>State of Ohio's Costs (in Millions)</th>
<th>State of Ohio's Gap to Peer (in Millions)</th>
<th>State of Ohio's Gap to World-Class (in Millions)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total Rewards Administration</td>
<td>47.5</td>
<td>36.2</td>
<td>31.8</td>
</tr>
<tr>
<td>Time and Attendance</td>
<td>8.3</td>
<td>6.0</td>
<td>7.7</td>
</tr>
<tr>
<td>Payroll Administration</td>
<td>9.0</td>
<td>3.8</td>
<td>5.1</td>
</tr>
<tr>
<td>Data Management, Reporting and Compliance</td>
<td>14.2</td>
<td>6.5</td>
<td>8.6</td>
</tr>
<tr>
<td>Staffing Services</td>
<td>12.4</td>
<td>1.9</td>
<td>3.9</td>
</tr>
<tr>
<td>Workforce Development</td>
<td>13.0</td>
<td>2.2</td>
<td>1.8</td>
</tr>
<tr>
<td>Labor Relations</td>
<td>10.2</td>
<td>5.9</td>
<td>8.3</td>
</tr>
<tr>
<td>Organizational Effectiveness</td>
<td>7.2</td>
<td>(2.3)</td>
<td>(1.7)</td>
</tr>
<tr>
<td>Total Rewards Planning</td>
<td>0.7</td>
<td>(3.5)</td>
<td>(2.9)</td>
</tr>
<tr>
<td>Strategic Workforce Planning</td>
<td>1.7</td>
<td>(1.9)</td>
<td>(2.9)</td>
</tr>
<tr>
<td>Function Management</td>
<td>4.9</td>
<td>(2.6)</td>
<td>(1.6)</td>
</tr>
<tr>
<td>Total Process Costs</td>
<td>129.0</td>
<td>52.1</td>
<td>58.0</td>
</tr>
<tr>
<td>Technology Cost</td>
<td>6.1</td>
<td>(3.9)</td>
<td>(8.5)</td>
</tr>
<tr>
<td>Other Cost</td>
<td>7.3</td>
<td>(7.5)</td>
<td>(5.0)</td>
</tr>
<tr>
<td>Total HR Cost</td>
<td>142.4</td>
<td>40.7</td>
<td>44.5</td>
</tr>
</tbody>
</table>

### Cost Differences
The cost differences shown are mathematical calculations intended to give an understanding of processes with potential for performance improvement. Areas of focus and actual performance improvement targets should be developed only after considering issues such as organizational structure, business requirements, regulatory requirements, investments required and other factors.
Transaction Processing Costs and Staffing Levels

**Process Cost per Employee ($)**

- **State of Ohio:** $1,470
- **Comparable Orgs:** $493
- **World-Class:** $481

**Transaction Processing FTEs per State of Ohio’s Employees**

- **State of Ohio:** 546.7
- **Comparable Orgs:** 301.5
- **World-Class:** 200.9
Total Rewards Administration Process

<table>
<thead>
<tr>
<th>Total Rewards Administration Cost ($) per Employee</th>
<th>Total Rewards Administration FTEs per State of Ohio’s Employees</th>
</tr>
</thead>
<tbody>
<tr>
<td>$755 State of Ohio</td>
<td>99.4 State of Ohio</td>
</tr>
<tr>
<td>$93 Comparable Orgs</td>
<td>75.4 Comparable Orgs</td>
</tr>
<tr>
<td>$144 World-Class</td>
<td>69.9 World-Class</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Total Rewards Administration Cost ($) per Served</th>
<th>Total Rewards Administration Automation</th>
</tr>
</thead>
<tbody>
<tr>
<td>$1,122</td>
<td>State of Ohio Health &amp; Welfare 50% 98% 50%</td>
</tr>
<tr>
<td></td>
<td>Comparable Orgs Pension &amp; Savings 7% 27% 7%</td>
</tr>
<tr>
<td></td>
<td>World-Class Compensation 0% 27% 0%</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Total Rewards Administration Cost ($) per Employee</th>
</tr>
</thead>
<tbody>
<tr>
<td>$128 State of Ohio</td>
</tr>
<tr>
<td>$93 Comparable Orgs</td>
</tr>
<tr>
<td>$144 World-Class</td>
</tr>
</tbody>
</table>

The Hackett Group
February 13, 2008
Total Rewards Administration Process (Cont’d)

Error Rates for Transactions

Health & Welfare
- State of Ohio: 3%
- Comparable Orgs: 1%
- World-Class: 11%

Compensation
- State of Ohio: 4%
- Comparable Orgs: 3%
- World-Class: 1%

Pension & Savings Plans
- State of Ohio: 5%
- Comparable Orgs: 3%
- World-Class: 1%

Health & Welfare Plans per Thousand Enrolled Employees/Retirees

- State of Ohio: 0.3
- Comparable Orgs: 1.9
- World-Class: 2.0

Pension & Savings Plans per Thousand Enrolled Employees/Retirees

- State of Ohio: 0.1
- Comparable Orgs: 1.1
- World-Class: 0.5

Compensation Plans per Thousand Employees

- State of Ohio: 0.3
- Comparable Orgs: 3.9
- World-Class: 0.8
Payroll Administration Process (Cont’d)

Payroll Administration Automation

Pay Adjustments per Employee

Payroll Administration Best Practices

Extent distribution of direct deposit notifications is paperless

Extent a single common employee information database is shared between human resources and payroll
Data Management, Reporting & Compliance Process

Data Mgmt, Reporting & Compliance Cost ($)
per Employee

- State of Ohio: $263
- Comparable Orgs: $124
- World-Class: $19

Data Mgmt, Reporting & Compliance FTEs per State of Ohio’s Employees

- State of Ohio: 191.7
- Comparable Orgs: 101.5
- World-Class: 65.9

Data Management Automation

- State of Ohio: 23%
- Comparable Orgs: 29%
- Top Performers: 61%

Data Management Error Rate

- State of Ohio: 7%
- Comparable Orgs: 5%
- Top Performers: 1%
Data Management, Reporting & Compliance Best Practices

- Percent of time HR spends collecting and compiling information versus analyzing data for standard reports:
  - State of Ohio: Low
  - Top Performers: High

- Percent of time HR spends collecting and compiling information versus analyzing data for ad hoc reports:
  - State of Ohio: Low
  - Top Performers: High

- Extent statutory reports are produced automatically:
  - State of Ohio: Medium
  - Top Performers: High
Employee Life Cycle Costs and Staffing Levels

**Process Cost per Employee ($)**
- State of Ohio: $795
- Comparable Orgs: $653
- World-Class: $567

**Employee Life Cycle FTEs per State of Ohio’s Employees**
- State of Ohio: 521.9
- Comparable Orgs: 312.4
- World-Class: 301.9
### Staffing Services Process

#### Staffing Services Cost ($) per Employee

<table>
<thead>
<tr>
<th></th>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Labor</td>
<td>$227</td>
<td>$144</td>
<td>$130</td>
</tr>
<tr>
<td>Outsourcing</td>
<td>$3</td>
<td>$51</td>
<td>$29</td>
</tr>
</tbody>
</table>

#### Staffing Services FTEs per State of Ohio’s Employees

<table>
<thead>
<tr>
<th></th>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Process</td>
<td>173.1</td>
<td>92.5</td>
<td>102.5</td>
</tr>
</tbody>
</table>

#### Process Cost ($) per Hire/Placement

<table>
<thead>
<tr>
<th>State of Ohio</th>
<th>Comparable Orgs</th>
<th>World-Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>$1,962</td>
<td>$1,366</td>
<td>$1,255</td>
</tr>
</tbody>
</table>

#### Staffing Automation

- State of Ohio: 27%
- Comparable Orgs: 25%
- Top Performers: 80%
Staffing Services Process (Cont’d)

Total Placements/Hires per Staffing FTE

Days to Fill Open Positions

Terminations per Thousand Employees

Internal Placements versus External Hires
Staffing Services Best Practices

- Percent of time a competency profile is used in the selection process:
  - None
  - Low
  - Medium
  - High

- Extent new hire activities are automated:
  - Low
  - Medium
  - High

Legend:
- State of Ohio
- Top Performers
Workforce Development Process

**Workforce Development Cost ($) per Employee**

- State of Ohio: $208
- Comparable Orgs: $139
- World-Class: $155

**Workforce Development FTEs per State of Ohio’s Employees**

- State of Ohio: 148.4
- Comparable Orgs: 86.1
- World-Class: 80.1

**Key Best Practice Utilization Comparisons**

- Extent mentoring or coaching on new skills and behaviors takes place
- Extent training is offered on new tools, equipment and technology
- Extent job rotation outside current function is used to increase knowledge and understanding

- State of Ohio
- Top Performers
Organizational Effectiveness Process

Organizational Effectiveness Cost ($ per Employee

- State of Ohio: $7
- Comparable Orgs: $161
- World-Class: $148

Organizational Effectiveness FTEs per State of Ohio's Employees

- State of Ohio: 83.5
- Comparable Orgs: 93.3
- World-Class: 87.7
Labor Relations Process

Labor Relations Cost ($ per Employee

- State of Ohio: $5
- Comparable Orgs: $8
- World-Class: $1

Labor Relations FTEs per State of Ohio’s Employees

- State of Ohio: 116.9
- Comparable Orgs: 40.6
- World-Class: 31.5

Unions per Thousand Unionized Employees

- State of Ohio: 6
- Comparable Orgs: 3
- World-Class: 0.3

Grievances per Thousand Unionized Employees

- State of Ohio: 157
- Comparable Orgs: 63
- World-Class: 106
Strategic Costs and Staffing Levels

Process Cost per Employee ($)

- State of Ohio: $44
- Comparable Orgs: $145
- World-Class: $152

Strategic FTEs per State of Ohio’s FTEs

- State of Ohio: 63.5
- Comparable Orgs: 62.9
- World-Class: 26.0

The Hackett Group
February 13, 2008

State of Ohio Human Resources Rapid Benchmark Report
Strategic Workforce Planning Process

Strategic Workforce Planning Cost ($) per Employee

- State of Ohio: $31
- Comparable Orgs: $65
- World-Class: $81

Strategic Workforce Planning FTEs per State of Ohio’s Employees

- State of Ohio: 17.9
- Comparable Orgs: 31.8
- World-Class: 37.0

Key Best Practice Utilization Comparisons

- Extent an explicit workforce strategy has been articulated
- Extent key employees have been identified and formal retention plans created for these employees
- Extent strategic workforce plans identify scarce sets of skills and set a strategy for acquiring those skills

State of Ohio Human Resources Rapid Benchmark Report

The Hackett Group
February 13, 2008
Total Rewards Planning Process

**Total Rewards Planning Cost ($)/ per Employee**

- **State of Ohio**: $13
- **Comparable Orgs**: $62
- **World-Class**: $55

**Total Rewards Planning FTEs per State of Ohio's Employees**

- **State of Ohio**: 8.1
- **Comparable Orgs**: 31.7
- **World-Class**: 25.9

---

**Key Best Practice Utilization Comparisons**

- Not Applicable to State of Ohio
- Extent you participate in industry or function surveys regarding benefit plan design
- Extent there are explicit goals and targets set for benefit plans in terms of service levels, coverage or cost
- Extent there are explicit goals and targets set for compensation plans in terms of service levels, coverage or cost

State of Ohio Human Resources Rapid Benchmark Report
Table of Contents

- Section One
  - Sponsor’s Letter
- Section Two
  - Executive Summary
- Section Three
  - Appendix
    - Section One
      - Introduction
    - Section Two
      - Financial Rapid Benchmark Report
    - Section Three
      - Technology Rapid Benchmark Report
    - Section Four
      - Procurement Rapid Benchmark Report
    - Section Five
      - Human Resources Rapid Benchmark Report
- Section Six
  - Achieving World-Class Performance
- Section Seven
  - About The Hackett Group
What Does it Take to Achieve World-Class Performance?

- Track and communicate progress consistently to established performance targets
- Fact-based award recognition

- Use metrics to determine priorities, not “intuition”
- Establish infrastructure to lead change
- Evaluate strategic alternatives and business case

- External comparison of internal performance to world-class standards

- Understand proven approaches of world-class organizations
- Select “right” practices vs. maximum possible

Benchmarking and Best Practices are the foundation

- Develop a holistic solution encompassing
  - People (Organization)
  - Use of Information
  - Business Process
  - Technology
- Technology configuration and rapid execution

The Hackett Group
February 13, 2008
Improving all Key Business Drivers Simultaneously is Essential to Becoming World-Class

- **People**
  - Staffing levels
  - Resource allocation
  - Partnering
  - Organizational

- **Technology**
  - Technology leverage
  - System complexity
  - Standardization
  - Centralization

- **Process**
  - Productivity
  - Cycle times
  - Complexity

**Information**
- Performance measurement
- Access/availability
- Data vs. intelligence
- Actionable

= **World-class performance**
- Low cost
- High value
- Service levels
- Risk management
# Table of Contents

- **Section One**
  - Sponsor's Letter

- **Section Two**
  - Executive Summary

- **Section Three**
  - Appendix
    - Section One
      - Introduction
    - Section Two
      - Financial Rapid Benchmark Report
    - Section Three
      - Technology Rapid Benchmark Report
    - Section Four
      - Procurement Rapid Benchmark Report
    - Section Five
      - Human Resources Rapid Benchmark Report
    - Section Six
      - Achieving World-Class Performance

- **Section Seven**
  - About The Hackett Group
The Hackett Group defines world-class performance

The Hackett Group, a global strategic advisory firm, provides:

- Advisory Programs that support benchmarking and business transformation services for executives across the Global 2000
- Efficiency gains throughout enterprise SG&A activities by identifying, designing and implementing cost reduction initiatives
- Effectiveness improvements in areas such as working capital management to optimize cash flow generation
- Insight, advice, and best practice recommendations backed by performance metrics obtained through 14 years and 3,500 benchmark studies
- 30 years of experience delivering over $25 billion in sustainable cash benefits for clients across the globe

Mission: Enabling executives to achieve world-class enterprise performance
Hackett Defines General & Administrative Across 8 Functions and 64 Process Groups

<table>
<thead>
<tr>
<th>Finance</th>
<th>Human Resources</th>
<th>Sales</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cash Disbursements</td>
<td>Total Rewards Administration</td>
<td>Sales Execution</td>
</tr>
<tr>
<td>Revenue Cycle</td>
<td>Payroll Services</td>
<td>Sales Operations</td>
</tr>
<tr>
<td>Accounting and External</td>
<td>Data Management, Reporting and Compliance</td>
<td>Planning and Strategy</td>
</tr>
<tr>
<td>Reporting</td>
<td>Staffing Services</td>
<td>Function Management</td>
</tr>
<tr>
<td>Tax Management</td>
<td>Workforce Development Services</td>
<td></td>
</tr>
<tr>
<td>Treasury Management</td>
<td>Organizational Effectiveness</td>
<td></td>
</tr>
<tr>
<td>Compliance Management</td>
<td>Total Rewards Planning</td>
<td></td>
</tr>
<tr>
<td>Planning and Performance</td>
<td>Strategic Workforce Planning</td>
<td></td>
</tr>
<tr>
<td>Management</td>
<td>Function Management</td>
<td></td>
</tr>
<tr>
<td>Business Analysis</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Function Management</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Information Technology</th>
<th>Procurement</th>
<th>Service</th>
</tr>
</thead>
<tbody>
<tr>
<td>Infrastructure management</td>
<td>Supply Data Management</td>
<td>Order and Contract Management</td>
</tr>
<tr>
<td>End User Support</td>
<td>Requisition and PO Processing</td>
<td>Service Execution</td>
</tr>
<tr>
<td>Infrastructure Development</td>
<td>Supplier Scheduling</td>
<td>Service Operations</td>
</tr>
<tr>
<td>Application Maintenance</td>
<td>Receipt Processing</td>
<td>Planning and strategy</td>
</tr>
<tr>
<td>Application Development and Implementation</td>
<td>Compliance Management</td>
<td>Function Management</td>
</tr>
<tr>
<td>Quality Assurance</td>
<td>Customer Management</td>
<td></td>
</tr>
<tr>
<td>Risk Management</td>
<td>Sourcing Execution</td>
<td></td>
</tr>
<tr>
<td>IT Business Planning</td>
<td>Supplier Management and Development</td>
<td></td>
</tr>
<tr>
<td>Enterprise Architecture Planning</td>
<td>Function Strategy and Performance Management</td>
<td></td>
</tr>
<tr>
<td>Emerging Technologies</td>
<td>Sourcing and Supply Base Strategy</td>
<td></td>
</tr>
<tr>
<td>Function Management</td>
<td>Function Management</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Marketing</th>
<th></th>
<th>Executive and Corporate Svcs</th>
</tr>
</thead>
<tbody>
<tr>
<td>Marketing Communication</td>
<td></td>
<td>General Administration Management</td>
</tr>
<tr>
<td>Brand and Product Management</td>
<td></td>
<td>Travel and Transportation Services</td>
</tr>
<tr>
<td>Planning and Strategy</td>
<td></td>
<td>Real Estate &amp; Facilities Management</td>
</tr>
<tr>
<td>Market Research and Analytics</td>
<td></td>
<td>Government Affairs</td>
</tr>
<tr>
<td>Function Management</td>
<td></td>
<td>Legal</td>
</tr>
</tbody>
</table>

The Hackett Group
February 13, 2008
Hackett’s Knowledge Repository is Derived from 3,500 Studies of 2,100 of the World’s Leading Companies

Dow Jones Industrials
97% of the companies included in the Dow Jones Industrial Average are Hackett clients*

Fortune 100
77% of the companies included in the Fortune 100 are Hackett clients*

DAX 30
70% of the companies included in the DAX 30 are Hackett clients*

FTSE 100
50% of the companies included in the FTSE 100 are Hackett clients*

Dow Jones Global Titans Index
90% of the companies included in the Dow Jones Global Titans Index are Hackett clients*

*as of April 15, 2006