Tennessee Municipal Benchmarking Project
FY2003

Al Major
Municipal Technical Advisory Service, Alan.Major@tennessee.edu

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TENNESSEE MUNICIPAL BENCHMARKING PROJECT

2003 ANNUAL REPORT

PREPARED BY:

ALAN MAJOR
FINANCE & ACCOUNTING CONSULTANT

MTAS Municipal Technical Advisory Service
In cooperation with the Tennessee Municipal League
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</tr>
<tr>
<td>Police</td>
<td>32</td>
</tr>
<tr>
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<td>72</td>
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</table>
EXECUTIVE SUMMARY

This is the 2003 Annual Report of the Tennessee Municipal Benchmarking Project. The data is based on the actual results for the year ended June 30, 2003.

There are twelve cities in this report. They are presented in ascending order of population. The populations of the cities range from 23,120 to 173,890. Those cities are Maryville, Brentwood, Oak Ridge, Collierville, Cleveland, Germantown, Bartlett, Kingsport, Jackson, Clarksville, Chattanooga, and Knoxville.

There are three services measured and benchmarked: residential solid waste, police services, and fire services. Each section begins with a service description, next the actual data and measures, and then each city's graphs. The cost data includes all direct costs plus significant overhead items such as depreciation.

Residential solid waste is the collection of household refuses from residential premises and other locations. The service excludes waste from commercial dumpsters, yard waste and leaves, collection of recyclable material and any other special or non-routine service.

Police services consist of traditional law enforcement functions, including patrol, investigations, and police administration. These functions encompass preventive patrols, traffic enforcement, responding to calls for service, and investigation of crimes.

Specifically excluded from the service definition are: animal control and emergency communications (dispatch). The service definition does include all support personnel and services, except those relating to animal control and emergency communications.

Fire services consist of the entire range of services provided by the city's Fire Department, which may include fire suppression, fire prevention, fire code inspections, fire safety education, arson investigation, rescue, and/or Emergency Medical Services.
Each city is compared against the average of all the cities. Because of the population differences, there is three grouping of cities for three averages and graphs. Every city is compared against an All city average. This sheet of graphs is presented first. There is another graph sheet using an average of cities over 100,000 and another comparison with cities over 100,000. This format is used with all the services being measured.
### TENNESSEE MUNICIPAL BENCHMARKING PROJECT
#### COMMITTEE MEMBERS

#### STEERING COMMITTEE:

<table>
<thead>
<tr>
<th>NAME</th>
<th>CITY</th>
<th>TITLE</th>
</tr>
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<tbody>
<tr>
<td>Mark Brown</td>
<td>Bartlett</td>
<td>Finance Director</td>
</tr>
<tr>
<td>Kirk Bednar</td>
<td>Brentwood</td>
<td>Asst. City Manager</td>
</tr>
<tr>
<td>Brian Smart</td>
<td>Chattanooga</td>
<td>Accounting Manager</td>
</tr>
<tr>
<td>Wilbur Berry</td>
<td>Clarksville</td>
<td>Finance Director</td>
</tr>
<tr>
<td>Janice Casteel</td>
<td>Cleveland</td>
<td>Director of F &amp; A</td>
</tr>
<tr>
<td>David Smoak</td>
<td>Collierville</td>
<td>Asst. to City Manager</td>
</tr>
<tr>
<td>John Dluhos</td>
<td>Germantown</td>
<td>Finance Director</td>
</tr>
<tr>
<td>Russel Truell</td>
<td>Jackson</td>
<td>Finance Director</td>
</tr>
<tr>
<td>Katherine Latvala</td>
<td>Knoxville</td>
<td>Accounting Manager</td>
</tr>
<tr>
<td>Jim Griffin, Jr</td>
<td>Kingsport</td>
<td>City Manager</td>
</tr>
<tr>
<td>John Tate</td>
<td>Maryville</td>
<td>Finance Director</td>
</tr>
<tr>
<td>Amy Fitzgerald</td>
<td>Oak Ridge</td>
<td>Asst. City Manager</td>
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</table>

#### FINANCE COMMITTEE:

<table>
<thead>
<tr>
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<tr>
<td>Mark Brown</td>
<td>Bartlett</td>
<td>Finance Director</td>
</tr>
<tr>
<td>Carson Swinford</td>
<td>Brentwood</td>
<td>Finance Director</td>
</tr>
<tr>
<td>Brian Smart</td>
<td>Chattanooga</td>
<td>Accounting Manager</td>
</tr>
<tr>
<td>Wilbur Berry</td>
<td>Clarksville</td>
<td>Finance Director</td>
</tr>
<tr>
<td>Janice Casteel</td>
<td>Cleveland</td>
<td>Director of F &amp; A</td>
</tr>
<tr>
<td>David Smoak</td>
<td>Collierville</td>
<td>Asst. to City Manager</td>
</tr>
<tr>
<td>John Dluhos</td>
<td>Germantown</td>
<td>Finance Director</td>
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<tr>
<td>Russel Truell</td>
<td>Jackson</td>
<td>Finance Director</td>
</tr>
<tr>
<td>Katherine Latvala</td>
<td>Knoxville</td>
<td>Accounting Manager</td>
</tr>
<tr>
<td>Warren Searby</td>
<td>Kingsport</td>
<td>Accounting Manager</td>
</tr>
<tr>
<td>John Tate</td>
<td>Maryville</td>
<td>Finance Director</td>
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<tr>
<td>Janice McGinnis</td>
<td>Oak Ridge</td>
<td>Finance Director</td>
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TENNESSEE MUNICIPAL BENCHMARKING PROJECT
COMMITTEE MEMBERS

POLICE COMMITTEE:

<table>
<thead>
<tr>
<th>NAME</th>
<th>CITY</th>
<th>TITLE</th>
</tr>
</thead>
<tbody>
<tr>
<td>Mark Hopper</td>
<td>Bartlett</td>
<td>Asst. Chief</td>
</tr>
<tr>
<td>Jeff Hughes</td>
<td>Brentwood</td>
<td>Lieutenant</td>
</tr>
<tr>
<td>Lon Eilders</td>
<td>Chattanooga</td>
<td>Accreditation Mgr.</td>
</tr>
<tr>
<td>Mark Smith</td>
<td>Clarksville</td>
<td>Deputy Chief</td>
</tr>
<tr>
<td>Lee Reese</td>
<td>Cleveland</td>
<td>Chief</td>
</tr>
<tr>
<td>Jim Wilson</td>
<td>Collierville</td>
<td>Accreditation Mgr.</td>
</tr>
<tr>
<td>J Bruce</td>
<td>Germantown</td>
<td>Chief</td>
</tr>
<tr>
<td>Richard Staples</td>
<td>Jackson</td>
<td>Chief</td>
</tr>
<tr>
<td>Cindy G. Davis</td>
<td>Knoxville</td>
<td>Lieutenant</td>
</tr>
<tr>
<td>David Quillin</td>
<td>Kingsport</td>
<td>Deputy Chief</td>
</tr>
<tr>
<td>Tony Crisp</td>
<td>Maryville</td>
<td>Chief</td>
</tr>
<tr>
<td>David Beams</td>
<td>Oak Ridge</td>
<td>Chief</td>
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</tbody>
</table>

FIRE COMMITTEE:

<table>
<thead>
<tr>
<th>NAME</th>
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<th>TITLE</th>
</tr>
</thead>
<tbody>
<tr>
<td>Gary Graves</td>
<td>Bartlett</td>
<td>Asst. Chief</td>
</tr>
<tr>
<td>Kenny Lane</td>
<td>Brentwood</td>
<td>Chief</td>
</tr>
<tr>
<td>Kelvin L. Flint</td>
<td>Chattanooga</td>
<td>Asst. Chief</td>
</tr>
<tr>
<td>Mike Roberts</td>
<td>Clarksville</td>
<td>Chief</td>
</tr>
<tr>
<td>Bob Gaylor</td>
<td>Cleveland</td>
<td>Chief</td>
</tr>
<tr>
<td>Richard Arwood</td>
<td>Collierville</td>
<td>Asst. Chief</td>
</tr>
<tr>
<td>Dennis Wolf</td>
<td>Germantown</td>
<td>Chief</td>
</tr>
<tr>
<td>Don Friddle</td>
<td>Jackson</td>
<td>Fire Marshall</td>
</tr>
<tr>
<td>Roger D. Byrd</td>
<td>Knoxville</td>
<td>Fire Marshall</td>
</tr>
<tr>
<td>Charles A. White</td>
<td>Kingsport</td>
<td>Chief</td>
</tr>
<tr>
<td>Ed Mitchell</td>
<td>Maryville</td>
<td>Chief</td>
</tr>
<tr>
<td>Mac Bailey</td>
<td>Oak Ridge</td>
<td>Chief</td>
</tr>
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</table>
## TENNESSEE MUNICIPAL BENCHMARKING PROJECT
### COMMITTEE MEMBERS

### SOLID WASTE COMMITTEE:

<table>
<thead>
<tr>
<th>NAME</th>
<th>CITY</th>
<th>TITLE</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bill Yearwood</td>
<td>Bartlett</td>
<td>Public Works Mgr.</td>
</tr>
<tr>
<td>Not Applicable</td>
<td>Brentwood</td>
<td>Not Applicable</td>
</tr>
<tr>
<td>Beverly Pasley</td>
<td>Chattanooga</td>
<td>Dep.Adm.Public Works</td>
</tr>
<tr>
<td>Not Applicable</td>
<td>Clarksville</td>
<td>Not Applicable</td>
</tr>
<tr>
<td>Don Bowker</td>
<td>Cleveland</td>
<td>Public Works Director</td>
</tr>
<tr>
<td>Dynette Wisher</td>
<td>Collierville</td>
<td></td>
</tr>
<tr>
<td>Sam Beach</td>
<td>Germantown</td>
<td>Dir. Environmental Services</td>
</tr>
<tr>
<td>Brent Lewis</td>
<td>Jackson</td>
<td>Solid Waste Mgr</td>
</tr>
<tr>
<td>Bob Whetsel</td>
<td>Knoxville</td>
<td>Solid Waste Mgr</td>
</tr>
<tr>
<td>Betsy Dale</td>
<td>Kingsport</td>
<td>Sanitation Mgr.</td>
</tr>
<tr>
<td>Rick Whaley</td>
<td>Maryville</td>
<td>Public Works Mgr.</td>
</tr>
<tr>
<td>Amy Fitzgerald</td>
<td>Oak Ridge</td>
<td>Asst. City Manager</td>
</tr>
</tbody>
</table>
Residential Solid Waste Collection – Service Definition and Terms

Service Definition

Routinely scheduled collection of household refuse or garbage from residential premises and other locations, including small businesses, using containers small enough that residents and/or workers can move or lift them manually. This service may include small bulky items. The service excludes waste from commercial dumpsters, yard waste and leaves, collection of recyclable material and any other special or non-routine service. Transportation of refuse to the disposal site (landfill or transfer station) is included, but disposal costs (tipping fees) are excluded.

This service is provided by 9 of the 12 cities participating in the project. Brentwood, Clarksville, and Jackson do not provide residential solid waste collection as a city service.

Definitions of Terms Used

Residential Refuse Collected – This figure includes only household refuse collected on a regularly-scheduled basis, and includes those small businesses who use residential-sized containers that are collected on the same schedule as residences.

Residential Collection Points – A collection point is a single home, or an apartment or duplex unit or small business that has residential-sized containers that do not exceed the number of containers and/or capacity limit for residential service. It does not include commercial-sized containers that service multiple housing units, apartments or businesses.

Service Requests – This is a written or oral request that is recorded and requires an action. It excludes general information requests. Examples would include missed pickups, spillage, missing containers or lids, traffic problems involving collection vehicles, etc.

Tons of Refuse Collected Per FTE Employee – This measure is applied only to those cities that collect residential refuse with city employees and equipment (Chattanooga, Kingsport and Maryville) rather than through a contractor. It is a measure of the efficiency of the city refuse work crews, and is not available from contractors. An FTE is defined as 2,080 hours per year, which is one year at 40 hours per week.
Tennessee Municipal Benchmarking Program  
Residential Solid Waste Performance Data  
7/1/2002 - 6/30/2003

CITY DATA

<table>
<thead>
<tr>
<th></th>
<th>Maryville</th>
<th>Oak Ridge</th>
<th>Collierville</th>
<th>Cleveland</th>
<th>Germantown</th>
<th>Bartlett</th>
<th>Kingsport</th>
<th>Chattanooga</th>
<th>Knoxville</th>
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<tbody>
<tr>
<td>Population</td>
<td>23,120</td>
<td>26,788</td>
<td>37,044</td>
<td>37,192</td>
<td>40,203</td>
<td>42,347</td>
<td>44,905</td>
<td>155,554</td>
<td>173,890</td>
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<tr>
<td>City Area (sq. miles)</td>
<td>13</td>
<td>92</td>
<td>29</td>
<td>26</td>
<td>20</td>
<td>19</td>
<td>45</td>
<td>150</td>
<td>100</td>
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<tr>
<td>City Road Miles</td>
<td>103</td>
<td>210</td>
<td>257</td>
<td>268</td>
<td>192</td>
<td>261</td>
<td>418</td>
<td>1,100</td>
<td>1,250</td>
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<tr>
<td>Residential Refuse Collected (Tons)</td>
<td>7,430</td>
<td>11,056</td>
<td>13,087</td>
<td>10,276</td>
<td>13,916</td>
<td>22,800</td>
<td>15,576</td>
<td>48,750</td>
<td>47,237</td>
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<td>Residential Collection Points</td>
<td>6,525</td>
<td>11,645</td>
<td>11,487</td>
<td>12,542</td>
<td>11,931</td>
<td>10,074</td>
<td>16,137</td>
<td>61,000</td>
<td>56,535</td>
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<tr>
<td>Number of Full Time Equivalents</td>
<td>6.1</td>
<td>0</td>
<td>3.7</td>
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<td>0</td>
<td>12.0</td>
<td>16.5</td>
<td>32.0</td>
<td>23.0</td>
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<tr>
<td>Service Requests</td>
<td>701 (not available)</td>
<td>397</td>
<td>260</td>
<td>1,041</td>
<td>3,286</td>
<td>524</td>
<td>11,496</td>
<td>2,135</td>
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<tr>
<td>Collection Location:</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>Limited</td>
<td>Limited</td>
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<tr>
<td>Curbside</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>Limited</td>
<td>Limited</td>
<td>Limited</td>
<td>Limited</td>
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<tr>
<td>Back Door</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>Limited</td>
<td>Limited</td>
<td>Limited</td>
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<tr>
<td>Collection Frequency:</td>
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<td>X</td>
<td>X</td>
<td>Limited</td>
<td>Limited</td>
<td>Limited</td>
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<tr>
<td>Once a Week</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>Limited</td>
<td>Limited</td>
<td>Limited</td>
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<tr>
<td>Twice a Week</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>Limited</td>
<td>Limited</td>
<td>Limited</td>
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<tr>
<td>Total Cost</td>
<td>$543,348</td>
<td>$951,797</td>
<td>$2,052,737</td>
<td>$731,986</td>
<td>$3,504,531</td>
<td>$3,130,902</td>
<td>$1,509,139</td>
<td>$3,159,809</td>
<td>$4,367,278</td>
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CALCULATED BENCHMARKS

WORKLOAD

<table>
<thead>
<tr>
<th></th>
<th>Tons/1,000 Population</th>
<th>Tons/1,000 Collection Points</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>321</td>
<td>413</td>
</tr>
<tr>
<td></td>
<td>872</td>
<td>949</td>
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EFFICIENCY

<table>
<thead>
<tr>
<th></th>
<th>Cost/Ton Collected</th>
<th>Cost/Ton Collected - Curbside</th>
<th>Cost/Ton Collected - Back Door</th>
<th>Cost/Collection Point</th>
<th>Cost/Collection Point - Curbside</th>
<th>Cost/Collection Point - Back Door</th>
<th>Tons Collected/FTE (2,080 hrs.)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>$73</td>
<td>$73</td>
<td>$73</td>
<td>$73</td>
<td>$64</td>
<td>$64</td>
<td>1,218 (not available)</td>
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<tr>
<td></td>
<td>$86</td>
<td>$157</td>
<td>$71</td>
<td>$252</td>
<td>$137</td>
<td>$97</td>
<td>(not available)</td>
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<td></td>
<td>$86</td>
<td>$157</td>
<td>$71</td>
<td>$252</td>
<td>$137</td>
<td>$97</td>
<td>(not available)</td>
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<td></td>
<td>$64</td>
<td>$179</td>
<td>$58</td>
<td>$294</td>
<td>$311</td>
<td>$52</td>
<td>$77</td>
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EFFECTIVENESS

<table>
<thead>
<tr>
<th></th>
<th>Requests Per 1,000 Collect. Points</th>
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<tbody>
<tr>
<td></td>
<td>82 (not available)</td>
</tr>
</tbody>
</table>
### Calculated Benchmarks

**Workload**
- Tons/1,000 Population
  - Under: 371
  - Over: 293
  - All: 353
- Tons/1,000 Collection Points
  - Under: 1,168
  - Over: 817
  - All: 1,090

**Efficiency**
- Cost/Ton Collected
  - All: $115
- Cost/Ton Collected - Curbside
  - All: $99
- Cost/Ton Collected - Back Door
  - All: $169
- Cost/Collection Point
  - All: $134
- Cost/Collection Point - Curbside
  - All: $141
- Cost/Collection Point - Back Door
  - All: $126
- Tons Collected/FTE (2,080 hrs.)
  - All: 1,850

**Effectiveness**
- Svc. Requests Per 1,000 Collect. Points
  - All: 101
<table>
<thead>
<tr>
<th>Maryville</th>
<th>Residential Refuse Collection</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>City Profile</strong></td>
<td><strong>Explanatory Information</strong></td>
</tr>
<tr>
<td>Population: 23,120</td>
<td><strong>Service Level and Delivery</strong></td>
</tr>
<tr>
<td>Residential Refuse</td>
<td>Maryville collects residential refuse in standard 80 and 96-gallon carts once a week at curbside. The City provides back door pickup for handicapped and disabled residents.</td>
</tr>
<tr>
<td>Collected (tons): 7,430</td>
<td></td>
</tr>
<tr>
<td>Residential Collection Points: 8,525</td>
<td>The City uses rear loading refuse trucks with three men crews on three routes. The trucks average one trip per day to the landfill.</td>
</tr>
<tr>
<td>Service Requests: 701</td>
<td>The average distance to the landfill is five miles. There is no fee for residential service.</td>
</tr>
<tr>
<td>FTE Positions: 6.1</td>
<td><strong>Conditions Affecting Service, Performance, and Cost</strong></td>
</tr>
<tr>
<td></td>
<td>None</td>
</tr>
</tbody>
</table>

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
Oak Ridge  

Residential Refuse Collection

City Profile

<table>
<thead>
<tr>
<th>Population:</th>
<th>Residential Refuse</th>
</tr>
</thead>
<tbody>
<tr>
<td>26,788</td>
<td>Collected (tons): 11,056</td>
</tr>
</tbody>
</table>

Explanatory Information

Service Level and Delivery

The City of Oak Ridge contracts with Waste Connections of TN, Inc. for once a week residential backdoor refuse collection. Customers provide containers.

Collected (tons): 11,056

The city charges a monthly fee of $5.00/household. The fee includes collection and disposal for household refuse, curbside recycling, a Spring household trash and brush pickup and a Fall leaf pickup. All these pickup services are contracted to Waste Connections of TN, Inc.

Residential Collection Points: 11,645

Collection services are funded by fees and the city’s general fund.

Service Requests: N/A

Conditions Affecting Service, Performance, and Cost

The city’s contractor, Waste Connections of TN, Inc., collects recyclables at curbside weekly. Via contract with the city, Waste Connections of TN, Inc. also operates a convenience center in the city.

TENNESSEE MUNICIPAL BENCHMARKING PROJECT FY 2003 ANNUAL REPORT
SOLID WASTE - ALL CITIES

ALL CITIES AVERAGE

- Tons of Refuse Collected Per 1,000 Population
  - Oak Ridge: 413
  - 9-City Average: 353

- Cost Per Ton of Refuse Collected
  - Oak Ridge: $86
  - 9-City Average: $115

ALL CITIES AVERAGE

- Tons of Refuse Collected Per 1,000 Collection Points
  - Oak Ridge: 949
  - 9-City Average: 1,090

- Cost Per Ton of Refuse Collected at Backdoor
  - Oak Ridge: $82
  - 9-City Average: $134

ALL CITIES AVERAGE

- Cost Per Ton of Refuse Collected Per Collection Point
  - Oak Ridge: $86
  - 9-City Average: $115

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
<table>
<thead>
<tr>
<th>Collierville</th>
<th>Residential Refuse Collection</th>
</tr>
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<tbody>
<tr>
<td><strong>City Profile</strong></td>
<td><strong>Explanatory Information</strong></td>
</tr>
<tr>
<td>Population: 37,044</td>
<td><strong>Service Level and Delivery</strong></td>
</tr>
<tr>
<td>Residential Refuse</td>
<td>The City of Collierville uses city crews, standard 96-gallon carts and fully automated side loaders to collect residential refuse weekly at curbside.</td>
</tr>
<tr>
<td>Collected (tons): 13,087</td>
<td>A fee of $15/month funds refuse collection and disposal as well as collection of brush and bulky items.</td>
</tr>
<tr>
<td>Residential Collection Points: 11,487</td>
<td>Refuse is disposed at a city-owned transfer station. Then refuse is transported by the city approximately 46 one-way miles to a landfill owned by Waste Connections, Inc., Walnut, Mississippi.</td>
</tr>
<tr>
<td>Service Requests: 397</td>
<td><strong>Conditions Affecting Service, Performance, and Cost</strong></td>
</tr>
<tr>
<td>FTE Positions: 3.7</td>
<td>None</td>
</tr>
</tbody>
</table>

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
SOLID WASTE - ALL CITIES

ALL CITIES AVERAGE

Tons of Refuse Collected Per 1,000 Population

ALL CITIES AVERAGE

Cost Per Ton of Refuse Collected

ALL CITIES AVERAGE

Cost Per Ton of Refuse Collected at Curbside

ALL CITIES AVERAGE

Tons of Refuse Collected Per 1,000 Collection Points

ALL CITIES AVERAGE

Cost Per Ton of Refuse Collected Per Collection Point

ALL CITIES AVERAGE

Tons of Refuse Collected Per FTE Employee

ALL CITIES AVERAGE

Service Requests Per 1,000 Collection Points

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
<table>
<thead>
<tr>
<th>Cleveland</th>
<th>Residential Refuse Collection</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>City Profile</strong></td>
<td><strong>Explanatory Information</strong></td>
</tr>
<tr>
<td>Population: 37,192</td>
<td>Service Level and Delivery</td>
</tr>
<tr>
<td>Residential Refuse</td>
<td>The City of Cleveland contracts with Waste Connection of TN, Inc. for once per week curbside collection of residential refuse. Backdoor service is provided for handicapped and disabled residents.</td>
</tr>
<tr>
<td>Collected (tons): 10,276</td>
<td>Customers provide containers. A fee of $6/month funds refuse collection and disposal.</td>
</tr>
<tr>
<td>Residential Collection Points: 12,542</td>
<td>Waste Connections of TN, Inc. transports refuse to a landfill 14 miles away.</td>
</tr>
<tr>
<td>Service Requests: 260</td>
<td></td>
</tr>
<tr>
<td>FTE Positions: 0 (contract)</td>
<td></td>
</tr>
</tbody>
</table>

**Conditions Affecting Service, Performance, and Cost**

The city closely monitors contractor performance and promptly handles complaints. The city also contracts with Water Connections of TN, Inc. to provide refuse collection for commercial customers.
SOLID WASTE - ALL CITIES

**ALL CITIES AVERAGE**

- **Tons of Refuse Collected Per 1,000 Population**
  - Cleveland: 276
  - 9-City Average: 353

- **Cost Per Ton of Refuse Collected**
  - Cleveland: $71
  - 9-City Average: $115

**ALL CITIES AVERAGE**

- **Tons of Refuse Collected Per 1,000 Collection Points**
  - Cleveland: 819
  - 9-City Average: 1,090

- **Cost Per Ton of Refuse Collected at Curbside**
  - Cleveland: $71
  - 7-City Average: $99

**ALL CITIES AVERAGE**

- **Service Requests Per 1,000 Collection Points**
  - Cleveland: 21
  - 8-City Average: 101

- **Cost Per Ton of Refuse Collected Per Collection Point**
  - Cleveland: $58
  - 9-City Average: $134

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
SOLID WASTE - UNDER 100,000 POPULATION CITIES

UNDER 100,000 POPULATION CITIES AVERAGE

- Tons of Refuse Collected Per 1,000 Population
- Cleveland
- 7-City Average

- Cost Per Ton of Refuse Collected
- Cleveland
- 7-City Average

- Tons of Refuse Collected Per 1,000 Collection Points
- Cleveland
- 7-City Average

- Cost Per Ton of Refuse Collected at Curbside
- Cleveland
- 4-City Average

- Service Requests Per 1,000 Collection Points
- Cleveland
- 6-City Average

- Cost Per Ton of Refuse Collected Per Collection Point
- Cleveland
- 7-City Average

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
<table>
<thead>
<tr>
<th>Germantown</th>
<th>Residential Refuse Collection</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>City Profile</strong></td>
<td><strong>Explanatory Information</strong></td>
</tr>
<tr>
<td>Population: 40,203</td>
<td><strong>Service Level and Delivery</strong></td>
</tr>
<tr>
<td>Residential Refuse</td>
<td>The City of Germantown contracts with Browning Ferris Industries, Inc. (BFI) for once per week backdoor collection of residential refuse. Customers provide containers.</td>
</tr>
<tr>
<td>Collected (tons): 13,916</td>
<td>A fee of $23.50/month funds weekly backdoor refuse, collection and weekly curbside collection of bulky items, recyclables and brush. BFI provides all these services.</td>
</tr>
<tr>
<td>Residential Collection Points: 11,931</td>
<td>Refuse is transported by BFI approximately 25 one-way miles to a landfill owned by BFI.</td>
</tr>
<tr>
<td>Service Requests: 1,041</td>
<td><strong>Conditions Affecting Service, Performance, and Cost</strong></td>
</tr>
<tr>
<td>FTE Positions: 0 (contract)</td>
<td>The city closely monitors contractor performance and promptly handles complaints.</td>
</tr>
</tbody>
</table>

TENNESSEE MUNICIPAL BENCHMARKING PROJECT FY 2003 ANNUAL REPORT

17
SOLID WASTE - ALL CITIES

ALL CITIES AVERAGE
Tons of Refuse Collected Per 1,000 Population

ALL CITIES AVERAGE
Tons of Refuse Collected Per 1,000 Collection Points

ALL CITIES AVERAGE
Cost Per Ton of Refuse Collected

ALL CITIES AVERAGE
Cost Per Ton of Refuse Collected at Backdoor

ALL CITIES AVERAGE
Service Requests Per 1,000 Collection Points

ALL CITIES AVERAGE
Cost Per Ton of Refuse Collected Per Collection Point

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
Bartlett Residential Refuse Collection

City Profile

Population: 42,347

Residential Refuse

Residential Collection Points: 10,074

Collected (tons): 22,800

Service Requests: 3,236

FTE Positions: 12

Explanatory Information

Service Level and Delivery

The City of Bartlett uses city crews, standard 96-gallon carts and fully automated side loaders to collect residential refuse weekly at curbside. Backdoor service is provided for handicapped and disabled residents.

A fee of $17/month funds refuse collection and disposal as well as collection/disposal of brush and bulky items.

Refuse is disposed at a city-owned transfer station. Then refuse is transported by the city approximately 25 one-way miles to a landfill owned by Browning Ferris Industries, Inc. (BFI).

Conditions Affecting Service, Performance, and Cost

The number of new residential customers is increasing at about 30/month.
SOLID WASTE - ALL CITIES

ALL CITIES AVERAGE

Tons of Refuse Collected Per 1,000 Population

ALL CITIES AVERAGE

Cost Per Ton of Refuse Collected

ALL CITIES AVERAGE

Tons of Refuse Collected Per 1,000 Collection Points

ALL CITIES AVERAGE

Cost Per Ton of Refuse Collected at Curbside

ALL CITIES AVERAGE

Service Requests Per 1,000 Collection Points

ALL CITIES AVERAGE

Cost Per Ton of Refuse Collected Per Collection Point

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
SOLID WASTE - UNDER 100,000 POPULATION CITIES

UNDER 100,000 POPULATION CITIES AVERAGE

- Tons of Refuse Collected Per 1,000 Population
  - Bartlett: 538
  - 7-City Average: 371

- Cost Per Ton of Refuse Collected
  - Bartlett: $137
  - 7-City Average: $125

UNDER 100,000 POPULATION CITIES AVERAGE

- Tons of Refuse Collected Per 1,000 Collection Points
  - Bartlett: 2,263
  - 7-City Average: 1,168

- Cost Per Ton of Refuse Collected at Curbside
  - Bartlett: $137
  - 4-City Average: $107

UNDER 100,000 POPULATION CITIES AVERAGE

- Tons of Refuse Collected Per FTE Employee
  - Bartlett: 1,900
  - 4-City Average: 1,890

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
### Kingsport Residential Refuse Collection

<table>
<thead>
<tr>
<th>City Profile</th>
<th>Explanatory Information</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Population:</strong></td>
<td><strong>Service Level and Delivery</strong>&lt;br&gt;The City of Kingsport uses two-men city crews and side loading and rear loading trucks to collect residential refuse weekly at curbside. Backdoor service is available for a fee.</td>
</tr>
<tr>
<td>44,905</td>
<td><strong>Collected (tons):</strong> 15,576&lt;br&gt;There is no fee for curbside refuse collection and disposal. Customers provide containers.</td>
</tr>
<tr>
<td><strong>Residential Refuse</strong></td>
<td><strong>Residential Collection Points:</strong> 16,137&lt;br&gt;Refuse is disposed at a county-owned transfer station. The one-way haul distance is approximately 5 miles.</td>
</tr>
<tr>
<td><strong>Collected (tons):</strong> 15,576</td>
<td><strong>Service Requests:</strong> 524</td>
</tr>
<tr>
<td><strong>Residential Collection Points:</strong> 16,137</td>
<td><strong>FTE Positions:</strong> 16.5</td>
</tr>
<tr>
<td><strong>Service Requests:</strong> 524</td>
<td><strong>Conditions Affecting Service, Performance, and Cost</strong>&lt;br&gt;Re-designed collection routes resulted in the reduction of alley collections.</td>
</tr>
<tr>
<td><strong>FTE Positions:</strong> 16.5</td>
<td></td>
</tr>
</tbody>
</table>

---

**TENNESSEE MUNICIPAL BENCHMARKING PROJECT**<br>**FY 2003 ANNUAL REPORT**
SOLID WASTE - UNDER 100,000 POPULATION CITIES

UNDER 100,000 POPULATION CITIES AVERAGE

- **Tons of Refuse Collected Per 1,000 Population**
  - Kingsport: 347
  - 7-City Average: 371

- **Cost Per Ton of Refuse Collected**
  - Kingsport: $97
  - 7-City Average: $125

UNDER 100,000 POPULATION CITIES AVERAGE

- **Tons of Refuse Collected Per 1,000 Collection Points**
  - Kingsport: 965
  - 7-City Average: 1,168

- **Cost Per Ton of Refuse Collected at Curbside**
  - Kingsport: $97
  - 4-City Average: $107

UNDER 100,000 POPULATION CITIES AVERAGE

- **Tons of Refuse Collected Per FTE Employee**
  - Kingsport: 944
  - 4-City Average: 1,890

- **Cost Per Ton of Refuse Collected Per Collection Point**
  - Kingsport: $94
  - 7-City Average: $154

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
### Chattanooga Residential Refuse Collection

<table>
<thead>
<tr>
<th>City Profile</th>
<th>Explanatory Information</th>
</tr>
</thead>
<tbody>
<tr>
<td>Population: 155,554</td>
<td><strong>Service Level and Delivery</strong></td>
</tr>
<tr>
<td>Residential Refuse</td>
<td>The City of Chattanooga collects residential refuse once per week at the curb. Backdoor pickup is provided for handicapped and disabled residents. 96-gallon containers are provided where there is automated service.</td>
</tr>
<tr>
<td>Collected (tons): 48,750</td>
<td></td>
</tr>
<tr>
<td>Residential Collection Points: 61,000</td>
<td></td>
</tr>
<tr>
<td>Service Requests: 1,499</td>
<td></td>
</tr>
<tr>
<td>FTE Positions: 32</td>
<td><strong>Conditions Affecting Service, Performance, and Cost</strong></td>
</tr>
<tr>
<td></td>
<td>Hilly terrain in many parts of the city necessitates the use of two and three-men crew vehicles. These crews are more expensive to operate than one-man crew fully automated vehicles.</td>
</tr>
</tbody>
</table>

**TENNESSEE MUNICIPAL BENCHMARKING PROJECT**

**FY 2003 ANNUAL REPORT**
SOLID WASTE - ALL CITIES

ALL CITIES AVERAGE

- Tons of Refuse Collected Per 1,000 Population
- Cost Per Ton of Refuse Collected
- Tons of Refuse Collected Per 1,000 Collection Points
- Cost Per Ton of Refuse Collected at Curbside
- Tons of Refuse Collected Per FTE Employee
- Service Requests Per 1,000 Collection Points

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
Knoxville Residential Refuse Collection

City Profile

Population: 173,890

Residential Refuse

Collected (tons): 47,237

Residential Collection Points: 56,535

Service Requests: 2,135

FTE Positions: 0 (contract)

Explanatory Information

Service Level and Delivery

The city contracts for residential refuse once per week at the backdoor. The contractor uses rear-loaders with three-man crews and some satellite pickups with one-man crews. Customers provide containers.

There are fifteen residential routes and the trucks make one to two trips per day to the landfill which is a distance of 35 miles one-way.

There is no fee for residential service.

Conditions Affecting Service, Performance, and Cost

The travel distance to the landfill.

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
SOLID WASTE - ALL CITIES

**ALL CITIES AVERAGE**

**Tons of Refuse Collected Per 1,000 Population**

- Knoxville
- 9-City Average

- 272
- 353

**ALL CITIES AVERAGE**

**Cost Per Ton of Refuse Collected**

- Knoxville
- 9-City Average

- $92
- $115

**ALL CITIES AVERAGE**

**Tons of Refuse Collected Per 1,000 Collection Points**

- Knoxville
- 9-City Average

- 836
- 1,090

**ALL CITIES AVERAGE**

**Cost Per Ton of Refuse Collected at Curbside**

- Knoxville
- 7-City Average

- $92
- $99

**ALL CITIES AVERAGE**

**Tons of Refuse Collected Per FTE Employee**

- Knoxville
- 6-City Average

- 2,017
- 1,850

**ALL CITIES AVERAGE**

**Cost Per Ton of Refuse Collected Per Collection Point**

- Knoxville
- 9-City Average

- $134
- $77

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TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
Police – Terms Used

Definitions of Terms Used

TIBRS A & B Crimes – The Tennessee Incident-Based Reporting System is now the standard statewide system for reporting crimes in Tennessee. Part A Crimes consist of 22 specific serious crimes, including arson, assault, burglary, homicide, kidnapping, larceny/theft, fraud, drug crimes and sex crimes. Part B Crimes include 11 less serious categories of crimes such as bad checks, loitering and vagrancy, DUI, disorderly conduct, non-violent family offenses, liquor law violations, and trespassing.

Dispatched Calls – Calls that result in a response from a Police Patrol unit. Some cities may have a “teleserve” program, where low priority requests for service are handled via telephone, with no officer dispatched, which may be a factor in reducing the number of Dispatched Calls. Also includes officer-initiated calls.

FTE Positions – Number of hours worked in Police Patrol converted to “Full Time Equivalent” positions at 2,080 hours per year, where those figures were available. Since a standard work year is used, this figure may not correspond to the number of positions budgeted in the Patrol function. For some cities, the number of FTE’s may be a budgeted figure, rather than actual hours worked, which could result in either understating or overstating the actual hours worked.
Tennessee Municipal Benchmarking Program  
Police Performance Data  
7/1/2002 - 6/30/2003

<table>
<thead>
<tr>
<th></th>
<th>Maryville</th>
<th>Brentwood</th>
<th>Oak Ridge</th>
<th>Collierville</th>
<th>Cleveland</th>
<th>Germantown</th>
<th>Bartlett</th>
<th>Kingsport</th>
<th>Jackson</th>
</tr>
</thead>
<tbody>
<tr>
<td>Population</td>
<td>23,120</td>
<td>26,743</td>
<td>26,768</td>
<td>37,044</td>
<td>37,192</td>
<td>40,203</td>
<td>42,347</td>
<td>44,905</td>
<td>59,643</td>
</tr>
<tr>
<td>City Area (sq. miles)</td>
<td>13</td>
<td>41</td>
<td>92</td>
<td>29</td>
<td>316</td>
<td>20</td>
<td>19,485</td>
<td>45</td>
<td>51</td>
</tr>
<tr>
<td>City Road Miles</td>
<td>163</td>
<td>423</td>
<td>210</td>
<td>257</td>
<td>268</td>
<td>192</td>
<td>261</td>
<td>418</td>
<td>425</td>
</tr>
<tr>
<td>Calls For Service</td>
<td>54,218</td>
<td>24,200</td>
<td>32,411</td>
<td>34,441</td>
<td>69,610</td>
<td>49,076</td>
<td>42,454</td>
<td>41,600</td>
<td>85,558</td>
</tr>
<tr>
<td>Calls Actually Dispatched</td>
<td>54,218</td>
<td>24,200</td>
<td>32,411</td>
<td>34,441</td>
<td>69,610</td>
<td>49,076</td>
<td>42,454</td>
<td>41,600</td>
<td>85,558</td>
</tr>
<tr>
<td>TIBRS Group A Crimes</td>
<td>1,424</td>
<td>1,006</td>
<td>3,020</td>
<td>1,621</td>
<td>3,991</td>
<td>1,558</td>
<td>2,448</td>
<td>7,641</td>
<td>10,547</td>
</tr>
<tr>
<td>TIBRS Group B Crimes</td>
<td>249</td>
<td>92</td>
<td>475</td>
<td>830</td>
<td>1,903</td>
<td>1,744</td>
<td>240</td>
<td>4,428</td>
<td>1,357</td>
</tr>
<tr>
<td>Number of Full Time Equivalents</td>
<td>43</td>
<td>53</td>
<td>54</td>
<td>81</td>
<td>91</td>
<td>60</td>
<td>84</td>
<td>100</td>
<td>192</td>
</tr>
<tr>
<td>Number of Support Personnel</td>
<td>4</td>
<td>3</td>
<td>12</td>
<td>10</td>
<td>11</td>
<td>5</td>
<td>6</td>
<td>40</td>
<td>52</td>
</tr>
<tr>
<td>Traffic Accidents</td>
<td>1,137</td>
<td>907</td>
<td>1,695</td>
<td>899</td>
<td>2,725</td>
<td>885</td>
<td>1,186</td>
<td>3,323</td>
<td>4,996</td>
</tr>
<tr>
<td>Traffic Accidents w/Injury</td>
<td>171</td>
<td>143</td>
<td>223</td>
<td>148</td>
<td>316</td>
<td>104</td>
<td>249</td>
<td>959</td>
<td>481</td>
</tr>
<tr>
<td>Police Vehicles</td>
<td>53</td>
<td>61</td>
<td>31</td>
<td>59</td>
<td>117</td>
<td>69</td>
<td>80</td>
<td>135</td>
<td>136</td>
</tr>
<tr>
<td>Maintenance Costs</td>
<td>$83,827</td>
<td>$76,575</td>
<td>$28,205</td>
<td>$32,423</td>
<td>$35,658</td>
<td>$135,332</td>
<td>$139,517</td>
<td>$333,931</td>
<td>$405,036</td>
</tr>
<tr>
<td>Training Costs</td>
<td>22,921</td>
<td>57,488</td>
<td>22,146</td>
<td>45,414</td>
<td>34,615</td>
<td>33,357</td>
<td>37,311</td>
<td>37,000</td>
<td>101,660</td>
</tr>
<tr>
<td>Alarm Calls</td>
<td>804</td>
<td>3,884</td>
<td>2,533</td>
<td>3,564</td>
<td>3,514</td>
<td>5,341</td>
<td>4,662</td>
<td>3,588</td>
<td>10,373</td>
</tr>
<tr>
<td>Total Cost</td>
<td>$3,278,362</td>
<td>$4,305,193</td>
<td>$3,970,435</td>
<td>$5,462,612</td>
<td>$6,127,067</td>
<td>$7,213,177</td>
<td>$7,050,439</td>
<td>$6,373,683</td>
<td>$11,650,637</td>
</tr>
</tbody>
</table>

CALCULATED BENCHMARKS

WORKLOAD

<table>
<thead>
<tr>
<th></th>
<th>Cost/1,000 pop.</th>
<th>$141,798</th>
<th>$160,984</th>
<th>$148,217</th>
<th>$147,463</th>
<th>$164,742</th>
<th>$179,419</th>
<th>$166,492</th>
<th>$141,937</th>
<th>$195,340</th>
</tr>
</thead>
<tbody>
<tr>
<td>Group A &amp; B Crimes/1,000 pop.</td>
<td>72.4</td>
<td>41.1</td>
<td>130.5</td>
<td>66.2</td>
<td>147.7</td>
<td>68.0</td>
<td>63.5</td>
<td>268.8</td>
<td>199.5</td>
<td></td>
</tr>
<tr>
<td>FTE's/1,000 pop.</td>
<td>1.86</td>
<td>1.96</td>
<td>2.02</td>
<td>2.19</td>
<td>2.45</td>
<td>1.49</td>
<td>1.98</td>
<td>2.23</td>
<td>3.22</td>
<td></td>
</tr>
<tr>
<td>FTE's/road mile</td>
<td>0.26</td>
<td>0.13</td>
<td>0.26</td>
<td>0.32</td>
<td>0.34</td>
<td>0.31</td>
<td>0.32</td>
<td>0.24</td>
<td>0.45</td>
<td></td>
</tr>
<tr>
<td>FTE's/square mile</td>
<td>3.21</td>
<td>1.30</td>
<td>0.59</td>
<td>2.79</td>
<td>0.29</td>
<td>3.03</td>
<td>2.22</td>
<td>3.74</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

EFFICIENCY

<table>
<thead>
<tr>
<th></th>
<th>Cost/FTE's</th>
<th>$76,241</th>
<th>$81,230</th>
<th>$73,527</th>
<th>$67,440</th>
<th>$67,330</th>
<th>$120,220</th>
<th>$83,934</th>
<th>$63,737</th>
<th>$60,680</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cost/dispatched call</td>
<td>$60</td>
<td>$178</td>
<td>$123</td>
<td>$159</td>
<td>$88</td>
<td>$147</td>
<td>$166</td>
<td>$153</td>
<td>$136</td>
<td></td>
</tr>
<tr>
<td>Incoming Calls/FTE's</td>
<td>1261</td>
<td>457</td>
<td>600</td>
<td>425</td>
<td>765</td>
<td>818</td>
<td>505</td>
<td>416</td>
<td>446</td>
<td></td>
</tr>
<tr>
<td>Dispatched Calls/FTE's</td>
<td>1261</td>
<td>457</td>
<td>600</td>
<td>425</td>
<td>765</td>
<td>818</td>
<td>505</td>
<td>416</td>
<td>446</td>
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</table>

EFFECTIVENESS

<table>
<thead>
<tr>
<th></th>
<th>Traffic Injury to Accidents Ratio</th>
<th>0.15</th>
<th>0.16</th>
<th>0.13</th>
<th>0.16</th>
<th>0.12</th>
<th>0.12</th>
<th>0.21</th>
<th>0.29</th>
<th>0.12</th>
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</thead>
<tbody>
<tr>
<td></td>
<td>Accidents/Road Mile</td>
<td>6.98</td>
<td>2.14</td>
<td>8.07</td>
<td>3.50</td>
<td>10.17</td>
<td>4.61</td>
<td>4.54</td>
<td>7.95</td>
<td>9.64</td>
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</table>
## Tennessee Municipal Benchmarking Program
### Police Performance Data
7/1/2002 - 6/30/2003

<table>
<thead>
<tr>
<th></th>
<th>Clarksville</th>
<th>Chattanooga</th>
<th>Knoxville</th>
</tr>
</thead>
<tbody>
<tr>
<td>Population</td>
<td>103,455</td>
<td>155,554</td>
<td>173,890</td>
</tr>
<tr>
<td>City Area (sq. miles)</td>
<td>100</td>
<td>150</td>
<td>100</td>
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<tr>
<td>City Road Miles</td>
<td>638</td>
<td>1,100</td>
<td>1,250</td>
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<tr>
<td>Calls For Service</td>
<td>147,147</td>
<td>177,994</td>
<td>290,131</td>
</tr>
<tr>
<td>Calls Actually Dispatched</td>
<td>147,147</td>
<td>177,994</td>
<td>290,131</td>
</tr>
<tr>
<td>TIBRS Group A Crimes</td>
<td>11,968</td>
<td>25,263</td>
<td>21,748</td>
</tr>
<tr>
<td>TIBRS Group B Crimes</td>
<td>1,690</td>
<td>1,027</td>
<td>3,824</td>
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<tr>
<td>Number of Full Time Equivalents</td>
<td>240</td>
<td>472</td>
<td>403</td>
</tr>
<tr>
<td>Number of Support Personnel</td>
<td>28</td>
<td>199</td>
<td>101</td>
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<tr>
<td>Traffic Accidents</td>
<td>3,564</td>
<td>14,796</td>
<td>14,463</td>
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<tr>
<td>Traffic Accidents w/Injury</td>
<td>929</td>
<td>(not available)</td>
<td>2,778</td>
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<tr>
<td>Police Vehicles</td>
<td>282</td>
<td>496</td>
<td>585</td>
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<tr>
<td>Maintenance Costs</td>
<td>$342,607</td>
<td>$751,894</td>
<td>$1,295,773</td>
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<td>Training Costs</td>
<td>115,561</td>
<td>802,734</td>
<td>501,449</td>
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<td>Alarm Calls</td>
<td>322</td>
<td>23,494</td>
<td>24,878</td>
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<td>Total Cost</td>
<td>$13,736,800</td>
<td>$34,113,722</td>
<td>$37,755,703</td>
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### CALCULATED BENCHMARKS

#### WORKLOAD

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<tr>
<th>Cost/1,000 pop.</th>
<th>$132,780</th>
<th>$219,305</th>
<th>$217,124</th>
<th>$160,710</th>
<th>$189,736</th>
<th>$167,967</th>
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<tbody>
<tr>
<td>Group A &amp; B Crimes/1,000 pop.</td>
<td>132.0</td>
<td>169.0</td>
<td>147.1</td>
<td>117.5</td>
<td>149</td>
<td>125</td>
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<tr>
<td>FTE's/1,000 pop.</td>
<td>2.32</td>
<td>3.03</td>
<td>2.32</td>
<td>2.16</td>
<td>2.56</td>
<td>2.26</td>
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<tr>
<td>FTE's/road mile</td>
<td>0.38</td>
<td>0.43</td>
<td>0.32</td>
<td>0.29</td>
<td>0.38</td>
<td>0.31</td>
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<tr>
<td>FTE's/square mile</td>
<td>2.40</td>
<td>3.15</td>
<td>4.03</td>
<td>1.91</td>
<td>3.19</td>
<td>2.23</td>
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</table>

#### EFFICIENCY

<table>
<thead>
<tr>
<th>Cost/FTE's</th>
<th>$57,237</th>
<th>$72,275</th>
<th>$93,627</th>
<th>$77,149</th>
<th>$74,399</th>
<th>$76,461</th>
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<tr>
<td>Cost/dispatched call</td>
<td>$93</td>
<td>$192</td>
<td>$130</td>
<td>$134</td>
<td>$138</td>
<td>$135</td>
</tr>
<tr>
<td>Incoming Calls/FTE's</td>
<td>613</td>
<td>377</td>
<td>720</td>
<td>633</td>
<td>570</td>
<td>617</td>
</tr>
<tr>
<td>Dispatched Calls/FTE's</td>
<td>613</td>
<td>377</td>
<td>720</td>
<td>633</td>
<td>570</td>
<td>617</td>
</tr>
</tbody>
</table>

#### EFFECTIVENESS

| Traffic Injury to Accidents Ratio | 0.26 (not available) | 0.19 | 0.16 | 0.23 | 0.17 |
| Accidents/Road Mile           | 5.58 | 13.45 | 11.57 | 6.40 | 10.20 | 7.35 |
MARYVILLE POLICE SERVICES

Service level and Delivery

Maryville operates a full-service police department, including school resource officers and community precinct officers. The department currently operates out of the Blount County Sheriff’s Department complex, due to ongoing renovation of the police headquarters and city hall. The department maintains a “home fleet,” where officers are allowed to drive their police cars home.

Officers normally work five, eight-hour shifts per week. The department has utilized a schedule of four, ten-hour shifts in the past and may return to that schedule.

Conditions Affecting Service, Performance, and Cost

Maryville is approximately 15 miles from Knoxville, a city of 173,000 people. It also shares a boundary with the City of Alcoa, with a population of 7,000.
BRENTWOOD POLICE SERVICES

Service Level And Delivery

Brentwood operates a full-service police department including community service programs.

For the purposes of this report, the police department includes administration, patrol and criminal investigations. The department has an in-house dispatch operation, but that unit is not included in this report. The police department headquarters is part of the city’s municipal building.

Officers work eight hour shifts and are generally scheduled to work 40 hours per week. The department does not have a "take-home" car program.

The number of calls for service reported by the City does not include officer initiated calls for patrol officers while working special assignment on the Directed Enforcement Team.

Conditions Affecting Service, Performance, And Cost

Brentwood is part of the Nashville/Davidson County metropolitan area and is served by an interstate highway.
POLICE - ALL CITIES

**Injuries Per Traffic Accident**

**TIBRS Group A & B Crimes Per 1,000 Population**

**Police Cost Per FTE Per 1,000 Population**

**Cost Per Dispatched Police Call**

**Discharged Calls Per FTE**

**Police Cost Per 1,000 Population**

**Traffic Accidents Per Road Mile**

**FTE's Per Road Mile**

**TENNESSEE MUNICIPAL BENCHMARKING PROJECT**

**FY 2003 ANNUAL REPORT**
Service Level and Delivery

Oak Ridge operates a full-service police department, including School Resource Officers and canine officers. The department also utilizes bicycle and motorcycle patrols. For the purposes of this study, the dispatch function will not be addressed in this report.

The department headquarters is located in City Hall, and the department has substations that officers use for report writing and meeting members of the public.

Officers generally work 12-hour shifts, and the department uses a 28 day, 160 hour work schedule, but the department requires each officer to work two "short" days each work period to balance the schedule.

Conditions Affecting Service, Performance, and Cost

The city limits include all of the Department of Energy federal reservation, and frequent protests there require the city to contribute manpower for security and arrests.
TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
COLLIERVILLE POLICE SERVICES

Service Level and Delivery

Collierville operates a full-service police department, including DARE, traffic officers and community relations officers.

The police department maintains a headquarters in the city hall building and operates a municipal jail. For the purposes of this study, the dispatch center and the jail unit are not included in this report. The city also operates a General Sessions Court.

Conditions Affecting Service, Performance, and Cost

Collierville is part of the Memphis metropolitan area and is immediately adjacent to the City of Memphis, a city of 650,000 people.
POLICE - CITIES UNDER 100,000 POPULATION

Injuries Per Traffic Accident

TIBRS Group A & B Crimes Per 1,000 Population

Police Cost Per FTE

Police FTE Per 1,000 Population

Cost Per Dispatched Police Call

Dispatched Calls Per FTE

Police Cost Per 1,000 Population

Traffic Accidents Per Road Mile

FTE's Per Road Mile

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
CLEVELAND POLICE SERVICES

Service Level and Delivery

Cleveland operates a full-service police department, including a part-time telephone response unit. The telephone response unit, staffed sporadically by officers on "light duty" due to illness or injury, relieves the department of physically responding to some calls for service, such as minor theft complaints, by taking the report via telephone. The department also provides DARE and School Resource officers for the local school system.

The department operates a police headquarters separate from the city municipal building. The department also operates several "substations" around the city that are not manned 24 hours per day. The department provides take-home vehicles for all but a few police officers.

Officers generally work four, 10-hour days per week. The 10-hour shifts allow significant overlapping of personnel during certain times of the day and certain days of the week.

Conditions Affecting Service, Performance, and Cost

Cleveland is located less than 20 miles from Chattanooga, a city with a population in excess of 155,000, and is located on an interstate highway.
TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT

Page 49
GERMANTOWN POLICE SERVICES

Service Level and Delivery

Germantown operates a full-service police department, including DARE, traffic officers and community relation's officers.

The police department maintains a headquarters in the city hall building and operates a municipal jail. For the purposes of this study, the dispatch center and the jail unit are not included in this report. The city also operates a General Sessions Court.

The department does not have a "home fleet."

Conditions Affecting Service, Performance, and Cost

Germantown is part of the Memphis metropolitan area and is immediately adjacent to the City of Memphis, a city of 650,000 people.
BARTLETT POLICE SERVICES

Service Level and Delivery

Bartlett operates a full-service police department, including DARE, traffic officers and community relations officers.

The police department maintains a headquarters in the city hall building and operates a municipal jail. For the purposes of this study, the dispatch center and the jail unit are not included in this report. The city also operates a General Sessions Court.

Conditions Affecting Service, Performance, and Cost

Bartlett is part of the Memphis metropolitan area and is immediately adjacent to the City of Memphis, a city of 650,000 people. The city has significant commercial and retail development and multiple interstate exits.
POLICE - CITIES UNDER 100,000 POPULATION

Injuries Per Traffic Accident

Traffic Accidents Per Road Mile

Police Cost Per FTE

Police Cost Per 1,000 Population

Cost Per Dispatched Police Call

Dispatched Calls Per FTE

FTE's Per Road Mile

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT

Page 56
KINGSPORT POLICE SERVICES

Service Level and Delivery

Kingsport operates a full-service police department, including DARE and School resource Officers.

The department shares space with the county in a two-story justice center adjacent to city hall. The department also has substations or offices outside of the police department headquarters. For the purposes of this study, dispatch and jail functions will not be addressed in this report.

Officers work 12-hour shifts, and the shift schedule results in an 80-hour work schedule every two-week work period.

The department has a “home fleet” where all officers are assigned a specific vehicle, and most officers drive the vehicles home.

Conditions Affecting Service, Performance, and Cost

The city has annexed multiple exits along the interstate, resulting in long “fingers,” well away from the city proper, that officers must patrol and answer calls for service.
POLICE - ALL CITIES

- Injuries Per Traffic Accident
  - Kingsport: 0.29
  - 11-City Average: 0.17

- TIBRS Group A & B Crimes Per 1,000 Population
  - Kingsport: 269
  - 12 City Average: 125

- Police Cost Per FTE
  - Kingsport: $63,737
  - 12-City Average: $76,461

- Police FTE Per 1,000 Population
  - Kingsport: 2.23
  - 12 City Average: 2.26

- Cost Per Dispatched Police Call
  - Kingsport: $153
  - 12-City Average: $135

- Dispatched Calls Per FTE
  - Kingsport: 416
  - 12-City Average: 617

- Police Cost Per 1,000 Population
  - Kingsport: $141,937
  - 12 City Average: $197,967

- Traffic Accidents Per Road Mile
  - Kingsport: 7.95
  - 12-City Average: 7.35

- FTE's Per Road Mile
  - Kingsport: 0.24
  - 12-City Average: 0.31

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
JACKSON POLICE SERVICES

Service Level and Delivery

Jackson operates a full-service police department, with School Resource Officers, community service programs and an aviation unit. For the purposes of this study the dispatch functions and the municipal jail functions are not included in this report.

Jackson is served by Interstate 40 and is a commercial and retail center for several surrounding counties. Officers generally work eight-hour shifts and are scheduled to work 40 hours per week.

Conditions Affecting Service, Performance, and Cost

None
Service Level and Delivery

Clarksville operates a full-service police department, including DARE officers. The department has three distinct districts, each operated almost as an independent police department. Each district has traffic, criminal investigation and patrol responsibilities.

The department has a headquarters building, and two districts have their own office space in other buildings. The department maintains a "home fleet" with officers allowed to drive the police vehicles home.

The department works 12-hour shifts, and officers are scheduled to work some "short" shifts to reduce the number of scheduled work hours below the overtime threshold.

Conditions Affecting Service, Performance, and Cost

A portion of the U. S. Army's Fort Campbell is inside the city, and the city is significantly impacted by commercial and residential development associated with the presence of the military base. The city is served by Interstate 24 and serves as a gateway for traffic going into and out of Kentucky.
Service Level and Delivery

The Chattanooga Police Department is a full-service police department, including DARE and School Resource Officers. The city is divided into distinct geographical areas, with Patrol Commanders having authority over all aspects of patrol activity in their area. The department has opened "precinct" offices in the city. The department operates a "tele-serve" unit, which handles complaints by telephone when the complainant does not need to speak to an officer in person.

The officers generally work eight hour shifts. The department has a partial "home fleet," with some officers allowed to drive the police vehicles home.

For the purposes of this study, the dispatch and animal control functions of the department are not included in this report.

Conditions Affecting Service, performance, and Cost

Two major interstates intersect in Chattanooga, producing a high traffic volume. The city is at the center of a metropolitan area and serves as a major shopping hub for a multi-county area, including counties in North Georgia. Chattanooga is a tourist destination and hosts conferences and conventions.
KNOXVILLE POLICE SERVICES

Service Level and Delivery

The Knoxville Police Department is a full-service police department, including DARE and School Resource Officers. The city is divided into distinct geographical areas, with Patrol Commanders having authority over all aspects of patrol activity in their area. The department has opened "precinct" offices in the city. The department operates a "tele-serve" unit, which handles complaints by telephone when the complainant does not need to speak to an officer in person.

The department has a partial "home fleet," with some officers allowed to drive the police vehicles home.

Conditions Affecting Service, performance, and Cost

Two major interstates run through Knoxville, producing a high traffic volume. The city is at the center of a metropolitan area and serves as a major shopping hub for a multi-county area. Knoxville is a tourist destination, gateway to the Great Smokey Mountains National Park, and hosts conferences and conventions.
FIRE SERVICES
Fire Service – Service Definition and Terms Used

Service Definition

Fire Service consists of the entire range of services provided by the city’s Fire Department, which may include fire suppression, fire prevention, fire code inspections, fire safety education, arson investigation, rescue, and/or Emergency Medical Services.

Definitions of Terms Used

Calls For Service – Includes all response categories for both emergency and non-emergency service that require use of Fire Department personnel and equipment.

Fire Calls – The total of all reported fires of all types, including structure fires. The reporting standard for all fire data is TFIRS, the Tennessee Fire Incident Reporting System, which complies with the standards of NFIRS, the National Fire Incident Reporting System operated by the U.S. Fire Administration, part of the Federal Emergency Management Agency (FEMA).

Fire Inspections – Includes inspections performed by both certified fire inspectors and by the staff of the city’s engine companies.

FTE Positions – Number of hours worked in the Fire Department converted to “Full Time Equivalent” positions at 2,760 hours per year. Since a standard work year is used, this figure may not correspond to the number of positions budgeted in the Fire Department. For some cities, the number of FTE’s may be a budgeted figure, rather than actual hours worked, which could result in either understating or overstating the actual hours worked.

Response Time – The beginning time at which the fire department (not the 911 or dispatch center) first becomes aware of the call and the ending time of when the first arriving FD unit is on the scene of the incident. The difference between these two times is Response Time.
### Tennessee Municipal Benchmarking Program
### Fire Performance Data
#### 7/1/2002 - 6/30/2003

<table>
<thead>
<tr>
<th></th>
<th>Maryville</th>
<th>Brentwood</th>
<th>Oak Ridge</th>
<th>Collierville</th>
<th>Cleveland</th>
<th>Germantown</th>
<th>Bartlett</th>
<th>Kingsport</th>
<th>Jackson</th>
</tr>
</thead>
<tbody>
<tr>
<td>Population</td>
<td>23,120</td>
<td>26,743</td>
<td>26,788</td>
<td>37,044</td>
<td>37,192</td>
<td>40,203</td>
<td>42,347</td>
<td>44,905</td>
<td>59,643</td>
</tr>
<tr>
<td>City Area (sq. miles)</td>
<td>13</td>
<td>41</td>
<td>92</td>
<td>29</td>
<td>26</td>
<td>20</td>
<td>19</td>
<td>45</td>
<td>51</td>
</tr>
<tr>
<td>City Road Miles</td>
<td>163</td>
<td>423</td>
<td>210</td>
<td>257</td>
<td>268</td>
<td>192</td>
<td>261</td>
<td>418</td>
<td>425</td>
</tr>
<tr>
<td>Non-Emergency Calls for Service</td>
<td>83</td>
<td>356</td>
<td>1,432</td>
<td>613</td>
<td>362</td>
<td>28</td>
<td>0</td>
<td>1,403</td>
<td>77</td>
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<td>Emergency Calls for Service</td>
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<td>1,443</td>
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<td>4,078</td>
<td>1,911</td>
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<td>Fire Calls</td>
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<td>95</td>
<td>105</td>
<td>126</td>
<td>271</td>
<td>96</td>
<td>85</td>
<td>260</td>
<td>534</td>
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<td>Structure Fires</td>
<td>16</td>
<td>13</td>
<td>44</td>
<td>64</td>
<td>60</td>
<td>45</td>
<td>32</td>
<td>60</td>
<td>153</td>
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<tr>
<td>Inspections by Fire Inspectors</td>
<td>737</td>
<td>130</td>
<td>939</td>
<td>1,350</td>
<td>342</td>
<td>151</td>
<td>2,816</td>
<td>2,855</td>
<td>341</td>
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<tr>
<td>Inspections by Fire Companies</td>
<td>1,470</td>
<td>217</td>
<td>1,137</td>
<td>459</td>
<td>65</td>
<td>1,066</td>
<td>141</td>
<td>0</td>
<td>1,268</td>
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<tr>
<td>Fire Code Violations</td>
<td>960</td>
<td>953</td>
<td>535</td>
<td>1,193</td>
<td>561</td>
<td>552</td>
<td>353</td>
<td>12,012</td>
<td>673</td>
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<tr>
<td>Fire Code Violations-% Cleared</td>
<td>85%</td>
<td>97%</td>
<td>88%</td>
<td>100%</td>
<td>75%</td>
<td>100%</td>
<td>95%</td>
<td>99%</td>
<td>90%</td>
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<tr>
<td>Number of Full Time Equivalents</td>
<td>26</td>
<td>58</td>
<td>49</td>
<td>64</td>
<td>80</td>
<td>68</td>
<td>73</td>
<td>96</td>
<td>156</td>
</tr>
<tr>
<td>City Appraised Value (Millions)</td>
<td>$1,741</td>
<td>$1,370</td>
<td>$1,600</td>
<td>$2,993</td>
<td>$1,926</td>
<td>$3,964</td>
<td>$2,746</td>
<td>$3,489</td>
<td>$3,076</td>
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<tr>
<td>Fire Cause Determined</td>
<td>85%</td>
<td>100%</td>
<td>97%</td>
<td>98%</td>
<td>92%</td>
<td>88%</td>
<td>75%</td>
<td>74%</td>
<td>74%</td>
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<tr>
<td>Fire Loss</td>
<td>$419,470</td>
<td>$2,644,540</td>
<td>$542,156</td>
<td>$1,133,003</td>
<td>$1,471,425</td>
<td>$806,845</td>
<td>$418,500</td>
<td>$810,418</td>
<td>$4,902,225</td>
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<tr>
<td>EMS Service Levels</td>
<td>1st Resp.</td>
<td>1st Resp.</td>
<td>ALS</td>
<td>ALS</td>
<td>NONE</td>
<td>ALS</td>
<td>1st Resp.</td>
<td>ALS</td>
<td>1st Resp./AET</td>
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<tr>
<td>EMS Calls</td>
<td>1,047</td>
<td>900</td>
<td>1,819</td>
<td>1,317</td>
<td>1,097</td>
<td>0</td>
<td>3,943</td>
<td>155</td>
<td></td>
</tr>
<tr>
<td>ISO Rating</td>
<td>3</td>
<td>4</td>
<td>3</td>
<td>3.7</td>
<td>10</td>
<td>4</td>
<td>3</td>
<td>3</td>
<td>3</td>
</tr>
<tr>
<td>Total Cost</td>
<td>$2,528,271</td>
<td>$4,215,130</td>
<td>$3,501,435</td>
<td>$4,984,243</td>
<td>$5,308,507</td>
<td>$5,540,568</td>
<td>$5,449,367</td>
<td>$5,909,498</td>
<td>$8,894,137</td>
</tr>
</tbody>
</table>

| Fire Service Cost Per 1,000 Pop. | $109,354 | $157,616 | $130,709 | $134,549    | $142,732  | $137,815  | $128,684 | $131,600   | $149,123 |
| Calls for Service Per 1,000 Pop. | 76        | 76        | 127      | 56          | 19        | 53        | 65       | 122        | 33      |
| Fire Inspections Per 1,000 Pop.  | 95        | 13        | 77       | 49          | 11        | 30        | 70       | 64         | 27      |
| Fire Code Violations-% Cleared   | 85.00%    | 97.00%    | 88.00%   | 100.00%     | 75.00%    | 100.00%   | 95.00%   | 99.00%     | 90.00%  |
| Structure Fires Per 1,000 Pop.  | 0.7       | 0.5       | 1.6      | 1.7         | 1.6       | 1.1       | 0.8      | 1.3        | 2.6     |
| Response Time                   | 3.31      | 4.53      | 4.55     | 3.34        | 4.08      | 4.55      | 4.50     | 4.12       | 5.08    |
| Cost Per Calls For Service      | $1,436    | $2,065    | $1,032   | $2,424      | $7,660    | $2,591    | $1,955   | $1,078     | $4,474  |
| Fire Cause Determined           | 85%       | 100%      | 97%      | 98%         | 92%       | 88%       | 75%      | 74%        | 74%     |
### Tennessee Municipal Benchmarking Program
#### Fire Performance Data
7/1/2002 - 6/30/2003

<table>
<thead>
<tr>
<th></th>
<th>Clarksville</th>
<th>Chattanooga</th>
<th>Knoxville</th>
</tr>
</thead>
<tbody>
<tr>
<td>Population</td>
<td>103,455</td>
<td>155,554</td>
<td>173,890</td>
</tr>
<tr>
<td>City Area (sq. miles)</td>
<td>100</td>
<td>150</td>
<td>100</td>
</tr>
<tr>
<td>City Road Miles</td>
<td>638</td>
<td>1,100</td>
<td>1,250</td>
</tr>
<tr>
<td>Non-Emergency Calls for Service</td>
<td>311</td>
<td>257</td>
<td>44</td>
</tr>
<tr>
<td>Emergency Calls for Service</td>
<td>4,866</td>
<td>9,342</td>
<td>29,364</td>
</tr>
<tr>
<td>Fire Calls</td>
<td>573</td>
<td>5,411</td>
<td>6,453</td>
</tr>
<tr>
<td>Structure Fires</td>
<td>100</td>
<td>280</td>
<td>437</td>
</tr>
<tr>
<td>Inspections by Fire Inspectors</td>
<td>1,262</td>
<td>2,982</td>
<td>4,161</td>
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<tr>
<td>Inspections by Fire Companies</td>
<td>0</td>
<td>3,512</td>
<td>0</td>
</tr>
<tr>
<td>Fire Code Violations</td>
<td>652</td>
<td>1,473</td>
<td>2,165</td>
</tr>
<tr>
<td>Fire Code Violations-% Cleared</td>
<td>97%</td>
<td>91%</td>
<td>98%</td>
</tr>
<tr>
<td>Number of Full Time Equivalents</td>
<td>360</td>
<td>431</td>
<td>333</td>
</tr>
<tr>
<td>City Appraised Value (Millions)</td>
<td>$3,669</td>
<td>$9,945</td>
<td>$7,786</td>
</tr>
<tr>
<td>Response Time</td>
<td>4 Min: 11</td>
<td>3 Min: 59</td>
<td>3 Min: 25</td>
</tr>
<tr>
<td>Fire Cause Determined</td>
<td>80%</td>
<td>76%</td>
<td>34%</td>
</tr>
<tr>
<td>Fire Loss</td>
<td>$2,505,198</td>
<td>$7,167,383</td>
<td>$4,803,133</td>
</tr>
<tr>
<td>EMS Service Levels</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>1st Resp.</td>
<td>1st Resp.</td>
<td>ALS</td>
<td></td>
</tr>
<tr>
<td>EMS Calls</td>
<td>1,944</td>
<td>4,188</td>
<td>11,013</td>
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<tr>
<td>ISO Rating</td>
<td>3</td>
<td>3</td>
<td>3</td>
</tr>
<tr>
<td>Total Cost</td>
<td>$10,601,601</td>
<td>$23,687,249</td>
<td>$23,789,077</td>
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</table>

<table>
<thead>
<tr>
<th></th>
<th>Under 100,000 Population Cities</th>
<th>Over 100,000 Population Cities</th>
<th>All Cities Average</th>
</tr>
</thead>
<tbody>
<tr>
<td>Fire Service Cost Per 1,000 Pop.</td>
<td>$102,475</td>
<td>$152,277</td>
<td>$136,805</td>
</tr>
<tr>
<td>Calls for Service Per 1,000 Pop.</td>
<td>50</td>
<td>62</td>
<td>169</td>
</tr>
<tr>
<td>Fire Inspections Per 1,000 Pop.</td>
<td>12</td>
<td>42</td>
<td>24</td>
</tr>
<tr>
<td>Fire Code Violations-% Cleared</td>
<td>97.00%</td>
<td>91.38%</td>
<td>98.00%</td>
</tr>
<tr>
<td>Structure Fires Per 1,000 Pop.</td>
<td>1.0</td>
<td>1.8</td>
<td>2.5</td>
</tr>
<tr>
<td>Response Time</td>
<td>4:11</td>
<td>3:59</td>
<td>3:25</td>
</tr>
<tr>
<td>Cost Per Calls For Service</td>
<td>$2,048</td>
<td>$2,468</td>
<td>$809</td>
</tr>
<tr>
<td>Fire Cause Determined</td>
<td>80%</td>
<td>76%</td>
<td>34%</td>
</tr>
</tbody>
</table>

Page 75
Maryville Fire Service

<table>
<thead>
<tr>
<th>City Profile</th>
<th>Explanatory Information</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Population:</strong></td>
<td><strong>Service Level and Delivery</strong></td>
</tr>
<tr>
<td>23120</td>
<td>Maryville operates a full-service fire department, and provides almost all of the services offered in Fire department in the state.</td>
</tr>
<tr>
<td>Land Area: 13 sq. mi.</td>
<td>The department provides fire prevention, public fire education, and code enforcement services.</td>
</tr>
<tr>
<td><strong>Calls For Service:</strong></td>
<td><strong>Firefighter pay scales are related to levels of training and certification.</strong></td>
</tr>
<tr>
<td>1,805</td>
<td>Fire Calls: 170, Structure Fires: 25</td>
</tr>
<tr>
<td><strong>Emergency Calls:</strong></td>
<td>Fire Inspections: 2,637</td>
</tr>
<tr>
<td>1,335</td>
<td>Fire Code Violations: 7,994</td>
</tr>
<tr>
<td><strong>Fire Calls:</strong></td>
<td>See the &quot;Fire Services Provided&quot; table at the beginning of this section for more detail.</td>
</tr>
<tr>
<td>170</td>
<td>Fire Code Violations Cleared Within 90 Days: 90%</td>
</tr>
<tr>
<td><strong>Structure Fires:</strong></td>
<td>Conditions Affecting Service, Performance, and Cost</td>
</tr>
<tr>
<td>25</td>
<td>None</td>
</tr>
<tr>
<td><strong>FTE Positions:</strong></td>
<td>Response Time: 3:44</td>
</tr>
<tr>
<td>42.3</td>
<td>EMS Level: 1st Responder</td>
</tr>
<tr>
<td><strong>Fire Inspections:</strong></td>
<td>EMS Calls: 1,110</td>
</tr>
<tr>
<td>2,637</td>
<td></td>
</tr>
<tr>
<td><strong>Fire Code Violations:</strong></td>
<td></td>
</tr>
<tr>
<td>7,994</td>
<td></td>
</tr>
<tr>
<td><strong>Fire Code Violations Cleared Within 90 Days:</strong></td>
<td></td>
</tr>
<tr>
<td>90%</td>
<td></td>
</tr>
</tbody>
</table>
ALL CITIES COMPARED TO AVERAGE:

**Fire Services Cost Per 1,000 Population**
- Maryville: $109,354
- 12 City Average: $134,478

**Structure Fire Per 1,000 Population**
- Maryville: 0.7
- 12 City Average: 1.4

**Calls For Fire Services Per 1,000 Population**
- Maryville: 76
- 12 City Average: 76

**Average Response Time**
- Maryville: 3:31
- 12 City Average: 4:18

**Fire Inspections Per 1,000 Population**
- Maryville: 95
- 12 City Average: 43

**Cost Per Calls For Service**
- Maryville: $1,436
- 12 City Average: $2,504

**Percentage of Fire Code Violations Cleared in 90 Days**
- Maryville: 85.00%
- 12 City Average: 92.95%

**Percentage of Structure Fires Where Cause is Determined**
- Maryville: 85%
- 12 City Average: 81%

---

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
<table>
<thead>
<tr>
<th>Brentwood Fire Service</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>City Profile</strong></td>
</tr>
<tr>
<td>Population: 26,743</td>
</tr>
<tr>
<td>Land Area: 40.8 sq. mi.</td>
</tr>
<tr>
<td>Calls For Service: 2,148</td>
</tr>
<tr>
<td>Emergency Calls: 1,738</td>
</tr>
<tr>
<td>Fire Calls: 120</td>
</tr>
<tr>
<td>Structure Fires: 19</td>
</tr>
<tr>
<td>FTE Positions: 37.5</td>
</tr>
<tr>
<td>Fire Inspections: 208</td>
</tr>
<tr>
<td>Fire Code Violations: 504</td>
</tr>
<tr>
<td>Fire Code Violations Cleared Within 90 Days: 90%</td>
</tr>
<tr>
<td>Response Time: 3:19</td>
</tr>
<tr>
<td>EMS Level: 1st Responder</td>
</tr>
<tr>
<td>EMS Calls: 965</td>
</tr>
</tbody>
</table>
ALL CITIES COMPARED TO AVERAGE

FIRE SERVICES COST PER 1,000 POPULATION

$200,000
$150,000
$100,000
$50,000
$0

- Brentwood
- 12 City Average

CALLS FOR FIRE SERVICES PER 1,000 POPULATION

- Brentwood
- 12 City Average

FIRE INSPECTIONS PER 1,000 POPULATION

- Brentwood
- 12 City Average

PERCENTAGE OF FIRE CODE VIOLATIONS CLEARED IN 90 DAYS

- Brentwood
- 12 City Average

STRUCTURE FIRE PER 1,000 POPULATION

- Brentwood
- 12 City Average

AVERAGE RESPONSE TIME

- Brentwood
- 12 City Average

COST PER CALLS FOR SERVICE

- Brentwood
- 12 City Average

PERCENTAGE OF STRUCTURE FIRES WHERE CAUSE IS DETERMINED

- Brentwood
- 12 City Average

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
### Oak Ridge

**City Profile**

<table>
<thead>
<tr>
<th>Population: 26,788</th>
</tr>
</thead>
<tbody>
<tr>
<td>Land Area: 92.0 sq. mi.</td>
</tr>
<tr>
<td>Calls For Service: 3,339</td>
</tr>
<tr>
<td>Emergency Calls: 1,161</td>
</tr>
<tr>
<td>Fire Calls: 241</td>
</tr>
<tr>
<td>Structure Fires: 144</td>
</tr>
<tr>
<td>FTE Positions: 40.9</td>
</tr>
<tr>
<td>Fire Inspections: 1,861</td>
</tr>
<tr>
<td>Fire Code Violations: 1,441</td>
</tr>
</tbody>
</table>

**Explanatory Information**

**Service Level and Delivery**

Oak Ridge operates a full-service fire department, and provides almost all of the services offered in any fire department in the state. The department provides fire prevention, public fire education, and code enforcement services.

Firefighter pay scales are related to levels of training and certification.

See the “Fire Services Provided” table at the beginning of this section for more detail.

**Conditions Affecting Service, Performance, and Cost**

The department has first-out, emergency response vehicles that are over 21 years old, which could affect performance.

<table>
<thead>
<tr>
<th>Response Time: 3:20</th>
</tr>
</thead>
<tbody>
<tr>
<td>EMS Level: ALS</td>
</tr>
<tr>
<td>EMS Calls: 1,866</td>
</tr>
</tbody>
</table>
FIRE CHARTS - ALL CITIES

ALL CITIES COMPARED TO AVERAGE

Fire Services Cost Per 1,000 Population

ALL CITIES COMPARED TO AVERAGE

Structure Fire Per 1,000 Population

ALL CITIES COMPARED TO AVERAGE

Calls For Fire Services Per 1,000 Population

ALL CITIES COMPARED TO AVERAGE

Average Response Time

ALL CITIES COMPARED TO AVERAGE

Fire Inspections Per 1,000 Population

ALL CITIES COMPARED TO AVERAGE

Cost Per Calls For Service

ALL CITIES COMPARED TO AVERAGE

Percentage of Fire Code Violations Cleared in 90 Days

ALL CITIES COMPARED TO AVERAGE

Percentage of Structure Fires Where Cause is Determined

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
FIRE CHARTS - CITIES UNDER 100,000 POPULATION

UNDER 100,000 POPULATION CITIES COMPARED TO AVERAGE

- Fire Services Cost Per 1,000 Population:
  - Oak Ridge: $130,709
  - 9 City Average: $135,798

- Calls for Fire Services Per 1,000 Population:
  - Oak Ridge: 127
  - 9 City Average: 70

- Fire Inspections Per 1,000 Population:
  - Oak Ridge: 77
  - 9 City Average: 48

- Percentage of Fire Code Violations Cleared in 90 Days:
  - Oak Ridge: 88.00%
  - 9 City Average: 92.11%

- Structure Fire per 1,000 Population:
  - Oak Ridge: 1.6
  - 9 City Average: 1.3

- Average Response Time:
  - Oak Ridge: 4:55
  - 9 City Average: 4:27

- Cost Per Calls for Service:
  - Oak Ridge: $1,032
  - 9 City Average: $2,747

- Percentage of Structure Fires Where Cause is Determined:
  - Oak Ridge: 97%
  - 9 City Average: 87%

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
Collierville

City Profile
Population: 37,044

Land Area: 29 sq. mi.

Collierville operates a full-service fire department, and provides almost all of the services offered in any fire department in the state.

The department also offers a wide range of non-emergency services including fire prevention, public fire education, and code enforcement activities.

Calls For Service: 2,056
Emergency Calls: 1,443
Fire Calls: 126
Structure Fires: 64

Firefighter pay scales are related to levels of training and certification.

FTE Positions: 64

See the “Fire Services Provided” table at the beginning of this section for more details.

Fire Inspections: 1,809
Fire Code Violations: 1,193
Fire Code Violations Cleared Within 90 Days: 100%
Response Time: 3:34
EMS Level: ALS
EMS Calls: 1,317

Conditions Affecting Service, Performance and Cost
None
ALL CITIES COMPARED TO AVERAGE

- Fire Services Cost Per 1,000 Population:
  - Collierville: $134,549
  - 12 City Average: $134,478

- Structure Fire Per 1,000 Population:
  - Collierville: 1.7
  - 12 City Average: 1.4

- Calls For Fire Services Per 1,000 Population:
  - Collierville: 56
  - 12 City Average: 76

- Average Response Time:
  - Collierville: 3.34
  - 12 City Average: 4.18

- Fire Inspections Per 1,000 Population:
  - Collierville: 49
  - 12 City Average: 43

- Cost Per Calls For Service:
  - Collierville: $2,424
  - 12 City Average: $2,504

- Percentage of Fire Code Violations Cleared in 90 Days:
  - Collierville: 100.00%
  - 12 City Average: 92.95%

- Percentage of Structure Fires Where Cause is Determined:
  - Collierville: 98%
  - 12 City Average: 81%

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
FIRE CHARTS-CITIES UNDER 100,000 POPULATION

UNDER 100,000 POPULATION CITIES COMPARED TO AVERAGE

- Fire Services Cost Per 1,000 Population
  - Collierville: $134,549
  - 9 City Average: $135,798

- Calls For Fire Services Per 1,000 Population
  - Collierville: 56
  - 9 City Average: 70

- Fire Inspections Per 1,000 Population
  - Collierville: 49
  - 9 City Average: 48

- Percentage of Fire Code Violations Cleared in 90 Days
  - Collierville: 100.00%
  - 9 City Average: 92.11%

- Structure Fire Per 1,000 Population
  - Collierville: 1.7
  - 9 City Average: 1.3

- Average Response Time
  - Collierville: 3.34
  - 9 City Average: 4.27

- Cost Per Calls For Service
  - Collierville: $2,424
  - 9 City Average: $2,747

- Percentage of Structure Fires Where Cause is Determined
  - Collierville: 98%
  - 9 City Average: 87%

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT

Page 87
## City Profile

<table>
<thead>
<tr>
<th>Population</th>
<th>37,192</th>
</tr>
</thead>
<tbody>
<tr>
<td>Land Area</td>
<td>26 sq. mi.</td>
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<td>Calls For Service</td>
<td>693</td>
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<tr>
<td>Emergency Calls</td>
<td>331</td>
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<tr>
<td>Fire Calls</td>
<td>271</td>
</tr>
<tr>
<td>Structure Fires</td>
<td>60</td>
</tr>
<tr>
<td>FTE Positions</td>
<td>80</td>
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<tr>
<td>Fire Inspections</td>
<td>407</td>
</tr>
<tr>
<td>Fire Code Violations</td>
<td>561</td>
</tr>
<tr>
<td>Fire Code Violations Cleared Within 90 Days</td>
<td>75%</td>
</tr>
<tr>
<td>Response Time</td>
<td>4:08</td>
</tr>
<tr>
<td>EMS Level</td>
<td>None</td>
</tr>
<tr>
<td>EMS Calls</td>
<td>None</td>
</tr>
<tr>
<td>EMS Calls</td>
<td>None</td>
</tr>
</tbody>
</table>

## Explanatory Information

### Service Level and Delivery

Cleveland operates a modern, up-to-date fleet of fire apparatus and provides the traditional services offered by most departments.

However, they do not provide emergency medical services.

The fire department also provides fire prevention education, and code enforcement services.

Cleveland also provides fire protection services for Bradley County (337 square miles). Costs and incidents outside the city limits are not included in this data.

See the "Fire Services Provided" table at the beginning of this section for more detail.

### Conditions Affecting Service, Performance, and Cost

None
FIRE CHARTS-CITIES UNDER 100,000 POPULATION

UNDER 100,000 POPULATION CITIES COMPARED TO AVERAGE

- Fire Services Cost Per 1,000 Population
  - $142,732 (Cleveland)
  - $135,798 (9 City Average)

- Calls For Fire Services Per 1,000 Population
  - 19 (Cleveland)
  - 70 (9 City Average)

- Fire Inspections Per 1,000 Population
  - 11 (Cleveland)
  - 48 (9 City Average)

- Percentage of Fire Code Violations Cleared in 90 Days
  - 75.00% (Cleveland)
  - 92.11% (9 City Average)

- Structure Fire Per 1,000 Population
  - 1.6 (Cleveland)
  - 1.3 (9 City Average)

- Average Response Time
  - 4:08 (Cleveland)
  - 4:27 (9 City Average)

- Cost Per Calls For Service
  - $7,660 (Cleveland)
  - $2,747 (9 City Average)

- Percentage of Structure Fires Where Cause is Determined
  - 92% (Cleveland)
  - 87% (9 City Average)

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
## Germantown Fire Service

<table>
<thead>
<tr>
<th>City Profile</th>
<th>Explanatory Information</th>
</tr>
</thead>
<tbody>
<tr>
<td>Population: 40,203</td>
<td><strong>Service Level and Delivery</strong></td>
</tr>
<tr>
<td>Land Area: 20 sq. mi.</td>
<td>Germantown operates a full-service fire department, and provides almost all of the services offered in any fire department in the state.</td>
</tr>
<tr>
<td>Calls For Service: 2,138</td>
<td>The department provides fire prevention, public fire education, and code enforcement services.</td>
</tr>
<tr>
<td>Emergency Calls: 2,110</td>
<td>The fire department has a written Master Plan.</td>
</tr>
<tr>
<td>Fire Calls: 96</td>
<td>Firefighter pay scales are related to levels of training and certification.</td>
</tr>
<tr>
<td>Structure Fires: 45</td>
<td>Fire Code Violations: 552</td>
</tr>
<tr>
<td>FTE Positions: 68</td>
<td>Fire Code Violations Cleared Within</td>
</tr>
<tr>
<td>Fire Inspections: 1,217</td>
<td>90 Days: 100%</td>
</tr>
<tr>
<td>Fire Code Violations</td>
<td>EMS Level: ALS</td>
</tr>
<tr>
<td>Cleared Within</td>
<td>EMS Calls: 1,097</td>
</tr>
<tr>
<td></td>
<td>Response Time: 4:55</td>
</tr>
</tbody>
</table>

**Conditions Affecting Service, Performance, and Cost**

None
### City Profile

<table>
<thead>
<tr>
<th>Population: 42,347</th>
</tr>
</thead>
<tbody>
<tr>
<td>Land Area: 19 sq. mi.</td>
</tr>
<tr>
<td>Calls For Service: 2,773</td>
</tr>
<tr>
<td>Emergency Calls: 2,773</td>
</tr>
<tr>
<td>Fire Calls: 85</td>
</tr>
<tr>
<td>Structure Fires: 32</td>
</tr>
<tr>
<td>FTE Positions: 73</td>
</tr>
<tr>
<td>Fire Inspections: 2,957</td>
</tr>
<tr>
<td>Fire Code Violations: 353</td>
</tr>
</tbody>
</table>

**Fire Code Violations Cleared Within**

- 90 Days: 95%

**Response Time:** 4:50

**EMS Level:**
- 1st Responder, BLS, ALS

**EMS Calls:** None

### Explanatory Information

#### Service Level and Delivery

Bartlett operates a full-service fire department, and provides almost all of the services offered in any fire department in the state.

The department provides fire prevention, public fire education, and code enforcement services.

See the "Fire Services Provided" table at the beginning of this section for more detail.

#### Conditions Affecting Service, Performance, and Cost

None
FIRE CHARTS - ALL CITIES

ALL CITIES COMPARED TO AVERAGE

- $128,684 $134,478
- Bartlett
- 12 City Average

Fire Services Cost Per 1,000 Population

ALL CITIES COMPARED TO AVERAGE

- 65 76
- Bartlett
- 12 City Average

Calls For Fire Services Per 1,000 Population

ALL CITIES COMPARED TO AVERAGE

- 70 43
- Bartlett
- 12 City Average

Fire Inspections Per 1,000 Population

ALL CITIES COMPARED TO AVERAGE

- 95.00% 92.95%
- Bartlett
- 12 City Average

Percentage of Fire Code Violations Cleared in 90 Days

ALL CITIES COMPARED TO AVERAGE

- 0.8 1.4
- Bartlett
- 12 City Average

Structure Fire Per 1,000 Population

ALL CITIES COMPARED TO AVERAGE

- 4:50 4:18
- Bartlett
- 12 City Average

Average Response Time

ALL CITIES COMPARED TO AVERAGE

- $1,965 $2,504
- Bartlett
- 12 City Average

Cost Per Calls For Service

ALL CITIES COMPARED TO AVERAGE

- 75% 81%
- Bartlett
- 12 City Average

Percentage of Structure Fires Where Cause is Determined

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
FIRE CHARTS-CITIES UNDER 100,000 POPULATION

UNDER 100,000 POPULATION CITIES COMPARED TO AVERAGE

Fire Services Cost Per 1,000 Population

<table>
<thead>
<tr>
<th>$200,000</th>
<th>$150,000</th>
<th>$100,000</th>
<th>$50,000</th>
<th>$0</th>
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<tbody>
<tr>
<td>Bartlett</td>
<td>128,684</td>
<td>135,798</td>
<td>9 City Average</td>
<td></td>
</tr>
</tbody>
</table>

Structure Fire Per 1,000 Population

<table>
<thead>
<tr>
<th>3.0</th>
<th>2.0</th>
<th>1.0</th>
<th>0.0</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bartlett</td>
<td>0.8</td>
<td>1.3</td>
<td>9 City Average</td>
</tr>
</tbody>
</table>

Calls For Fire Services Per 1,000 Population

<table>
<thead>
<tr>
<th>200</th>
<th>150</th>
<th>100</th>
<th>50</th>
<th>0</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bartlett</td>
<td>65</td>
<td>70</td>
<td>9 City Average</td>
<td></td>
</tr>
</tbody>
</table>

Average Response Time

<table>
<thead>
<tr>
<th>6:00</th>
<th>5:00</th>
<th>4:00</th>
<th>3:00</th>
<th>2:00</th>
<th>1:00</th>
<th>0:00</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bartlett</td>
<td>4:50</td>
<td>4:27</td>
<td>9 City Average</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Fire Inspections Per 1,000 Population

<table>
<thead>
<tr>
<th>200</th>
<th>150</th>
<th>100</th>
<th>50</th>
<th>0</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bartlett</td>
<td>70</td>
<td>48</td>
<td>9 City Average</td>
<td></td>
</tr>
</tbody>
</table>

Cost Per Calls For Service

<table>
<thead>
<tr>
<th>8000</th>
<th>6000</th>
<th>4000</th>
<th>2000</th>
<th>0</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bartlett</td>
<td>$1,965</td>
<td>$2,747</td>
<td>9 City Average</td>
<td></td>
</tr>
</tbody>
</table>

Percentage of Fire Code Violations Cleared in 90 Days

<table>
<thead>
<tr>
<th>100.00%</th>
<th>75.00%</th>
<th>50.00%</th>
<th>25.00%</th>
<th>0.00%</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bartlett</td>
<td>95.00%</td>
<td>92.11%</td>
<td>9 City Average</td>
<td></td>
</tr>
</tbody>
</table>

Percentage of Structure Fires Where Cause is Determined

<table>
<thead>
<tr>
<th>100%</th>
<th>75%</th>
<th>50%</th>
<th>25%</th>
<th>0%</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bartlett</td>
<td>75%</td>
<td>87%</td>
<td>9 City Average</td>
<td></td>
</tr>
</tbody>
</table>

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
Kingsport Fire Service

City Profile

Population: 44,905
Land Area: 45 sq. mi.
Calls For Service: 5,481
Emergency Calls: 4,078
Fire Calls: 260
Structure Fires: 60
FTE Positions: 96
Fire Inspections: 2,855
Fire Code Violations: 12,012
Fire Code Violations Cleared Within
90 Days: 99%
Response Time: 4:12
EMS Level: ALS
EMS Calls: 3,943

Explanatory Information

Service Level and Delivery

Kingsport operates a full-service fire department, and provides almost all of the services offered in any fire department in the state.

The department provides fire prevention, public fire education, and code enforcement services.

The fire department has a written Master Plan.

See the “Fire Services Provided” table at the beginning of this section for more detail.

Conditions Affecting Service, Performance, and Cost

Response time for the Kingsport department is affected by the city’s past annexation policy, which has resulted in lengthy, irregular extensions of the city limits which add to response time.
FIRE CHARTS - ALL CITIES

ALL CITIES COMPARED TO AVERAGE

Fire Services Cost Per 1,000 Population

$200,000
$150,000
$100,000
$50,000
$0

$131,600 $134,478

Kingsport
12 City Average

ALL CITIES COMPARED TO AVERAGE

Structure Fire Per 1,000 Population

0.0
1.0
2.0
3.0

1.3 1.4

Kingsport
12 City Average

ALL CITIES COMPARED TO AVERAGE

Calls For Fire Services Per 1,000 Population

0
50
100
150
200

122 76

Kingsport
12 City Average

ALL CITIES COMPARED TO AVERAGE

Average Response Time

0:00 1:00 2:00 3:00 4:00 5:00 6:00

Kingsport
12 City Average

ALL CITIES COMPARED TO AVERAGE

Fire Inspections Per 1,000 Population

0
50
100
150
200

64 43

Kingsport
12 City Average

ALL CITIES COMPARED TO AVERAGE

Cost Per Calls For Service

0
2000
4000
6000
8000

$1,078 $2,504

Kingsport
12 City Average

ALL CITIES COMPARED TO AVERAGE

Percentage of Fire Code Violations Cleared in 90 Days

0.00% 25.00% 50.00% 75.00% 100.00%

99.00% 92.95%

Kingsport
12 City Average

ALL CITIES COMPARED TO AVERAGE

Percentage of Structure Fires Where Cause is Determined

0% 25% 50% 75% 100%

74% 81%

Kingsport
12 City Average

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
### Jackson Fire Service

#### City Profile

<table>
<thead>
<tr>
<th>Population: 59,643</th>
</tr>
</thead>
<tbody>
<tr>
<td>Land Area: 51 sq. mi.</td>
</tr>
<tr>
<td>Calls For Service: 1,988</td>
</tr>
<tr>
<td>Emergency Calls: 1,911</td>
</tr>
<tr>
<td>Fire Calls: 534</td>
</tr>
<tr>
<td>Structure Fires: 153</td>
</tr>
<tr>
<td>FTE Positions: 156</td>
</tr>
<tr>
<td>Fire Inspections: 1,609</td>
</tr>
<tr>
<td>Fire Code Violations: 673</td>
</tr>
</tbody>
</table>

#### Explanatory Information

**Service Level and Delivery**

Jackson operates a modern, full-service fire department, but does not provide emergency medical service. The department provides fire prevention, public fire education, and code enforcement services.

The fire department has a written Master Plan.

See the “Fire Services Provided” table at the beginning of this section for more details.

**Conditions Affecting Service, Performance, and Cost**

The department has first-out, emergency response vehicles that are over 21 years old, which could affect performance.

<table>
<thead>
<tr>
<th>Fire Code Violations Cleared Within</th>
</tr>
</thead>
<tbody>
<tr>
<td>90 Days: 74%</td>
</tr>
<tr>
<td>Response Time: 5:08</td>
</tr>
<tr>
<td>EMS Level: None</td>
</tr>
<tr>
<td>EMS Calls: 155</td>
</tr>
</tbody>
</table>
ALL CITIES COMPARED TO AVERAGE

Fire Services Cost Per 1,000 Population

ALL CITIES COMPARED TO AVERAGE

Structure Fire Per 1,000 Population

ALL CITIES COMPARED TO AVERAGE

Calls For Fire Services Per 1,000 Population

ALL CITIES COMPARED TO AVERAGE

Average Response Time

ALL CITIES COMPARED TO AVERAGE

Fire Inspections Per 1,000 Population

ALL CITIES COMPARED TO AVERAGE

Cost Per Calls For Service

ALL CITIES COMPARED TO AVERAGE

Percentage of Fire Code Violations Cleared in 90 Days

ALL CITIES COMPARED TO AVERAGE

Percentage of Structure Fires Where Cause is Determined

FIRE CHARTS - ALL CITIES

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
UNDER 100,000 POPULATION CITIES COMPARED TO AVERAGE

FIRE SERVICES COST PER 1,000 POPULATION

$200,000 $150,000 $100,000 $50,000 $0

$149,123 $135,798

Jackson
9 City Average

$2,6
1.3

Jackson
9 City Average

STRUCTURE FIRE PER 1,000 POPULATION

2.6
1.3

Calls for Fire Services Per 1,000 Population

UNDER 100,000 POPULATION CITIES COMPARED TO AVERAGE

5:00
4:00
3:00
2:00
1:00
0:00

UNDER 100,000 POPULATION CITIES COMPARED TO AVERAGE

Average Response Time

5.08
4.27

Jackson
9 City Average

Fire Inspections Per 1,000 Population

UNDER 100,000 POPULATION CITIES COMPARED TO AVERAGE

200
150
100
50
0

27
48

Jackson
9 City Average

UNDER 100,000 POPULATION CITIES COMPARED TO AVERAGE

$4,474
$2,747

Jackson
9 City Average

Cost Per Calls For Service

UNDER 100,000 POPULATION CITIES COMPARED TO AVERAGE

Percentage of Fire Code Violations Cleared in 90 Days

100.00% 90.00% 92.11%

Jackson
9 City Average

TENNESSEE MUNICIPAL BENCHMARKING PROJECT FY 2003 ANNUAL REPORT
Clarksville

City Profile

Population: 103,455
Land Area: 100 sq. mi.

Calls For Service: 5,177
Emergency Calls: 4,866
Fire Calls: 573
Structure Fires: 100
FTE Positions: 360

Fire Inspections: 1,282
Fire Code Violations: 652

Fire Code Violations Cleared Within
90 Days: 97%

Response Time: 4:11
EMS Level: 1st Responder
EMS Calls: 1,944

Explanatory Information

Service Level and Delivery

Clarksville operates a modern well-equipped department, and is moving aggressively to improve fire services and enhance training of firefighters.

Significant investments are being made to train firefighters to a higher overall level of competency.

The department provides fire prevention, public fire education, and code enforcement activities.

See the “Fire Services Provided” table at the beginning of this section for more details.

Conditions Affecting Service, Performance, and Cost

The rapid growth of the city has made it difficult for the department to both expand service delivery and maintain coverage density.

The department has first-out, emergency response vehicles that are over 21 years old, which could affect performance.
ALL CITIES COMPARED TO AVERAGE

$200,000
$150,000
$100,000
$50,000
$0

Fire Services Cost Per 1,000 Population

$102,475
$134,478

Clarksville 12 City Average

ALL CITIES COMPARED TO AVERAGE

1.0
1.4

Structure Fire Per 1,000 Population

Clarksville 12 City Average

ALL CITIES COMPARED TO AVERAGE

50
76

Calls For Fire Services Per 1,000 Population

Clarksville 12 City Average

ALL CITIES COMPARED TO AVERAGE

4:11
4:18

Average Response Time

Clarksville 12 City Average

ALL CITIES COMPARED TO AVERAGE

12
43

Fire Inspections Per 1,000 Population

Clarksville 12 City Average

ALL CITIES COMPARED TO AVERAGE

97.00%
92.95%

Percentage of Fire Code Violations Cleared in 90 Days

Clarksville 12 City Average

ALL CITIES COMPARED TO AVERAGE

80%
81%

Percentage of Structure Fires Where Cause is Determined

Clarksville 12 City Average

TENNESSEE MUNICIPAL BENCHMARKING PROJECT FY 2003 ANNUAL REPORT
FIRE CHARTS - CITIES OVER 100,000 POPULATION

OVER 100,000 POPULATION CITIES
COMPARSED TO AVERAGE

- $102,475 - $130,519
  - Clarksville
  - 3 City Average

- $0
  - Fire Services Cost Per 1,000 Population

OVER 100,000 POPULATION CITIES
COMPARSED TO AVERAGE

- 1.0 - 1.8
  - Clarksville
  - 3 City Average

- 1:00 - 6:00
  - Structure Fire Per 1,000 Population

OVER 100,000 POPULATION CITIES
COMPARSED TO AVERAGE

- 50 - 94
  - Clarksville
  - 3 City Average

- 0
  - Calls For Fire Services Per 1,000 Population

OVER 100,000 POPULATION CITIES
COMPARSED TO AVERAGE

- 12 - 26
  - Clarksville
  - 3 City Average

- 0
  - Fire Inspections Per 1,000 Population

OVER 100,000 POPULATION CITIES
COMPARSED TO AVERAGE

- $2,048 - $1,775
  - Clarksville
  - 3 City Average

- 0 - 8,000
  - Cost Per Calls For Service

OVER 100,000 POPULATION CITIES
COMPARSED TO AVERAGE

- 97.00% - 95.46%
  - Clarksville
  - 3 City Average

- 0.00% - 100.00%
  - Percentage of Fire Code Violations Cleared in 90 Days

OVER 100,000 POPULATION CITIES
COMPARSED TO AVERAGE

- 80% - 63%
  - Clarksville
  - 3 City Average

- 0% - 100%
  - Percentage of Structure Fires Where Cause is Determined

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
Chattanooga

City Profile

Population: 155,554

Land Area 150 sq. mi.

Calls For Service: 9,599
Emergency Calls: 9,342
Fire Calls: 5,411
Structure Fires: 280

FTE Positions: 431

Fire Inspections: 6,494
Fire Code Violations: 1,473

Fire Code Violations Cleared Within
90 Days: 91%

Response Time: 3:59

EMS Level: 1st Responder

EMS Calls: 4,188

Explanatory Information

Service Level and Delivery

Chattanooga has made a major effort in the past few years to modernize and upgrade their fire department.

A significant capital investment is being made to modernize the fire department fleet.

The department provides fire prevention, public fire education, and code enforcement services.

Firefighter pay scales are related to levels of training and certification.

See the "Fire Services Provided" table at the beginning of this section for more details.

Conditions Affecting Service, Performance, and Cost

The department has many first-out, emergency response that are over 21 years old, which could affect performance.

Replacement of those vehicles could affect future operational costs.
ALL CITIES COMPARED TO AVERAGE

Fire Services Cost Per 1,000 Population

$152,277
$134,478

Chattanooga
12 City Average

Structure Fire Per 1,000 Population

1.8
1.4

Chattanooga
12 City Average

Calls For Fire Services Per 1,000 Population

62
76

Chattanooga
12 City Average

Average Response Time

3:59
4:18

Chattanooga
12 City Average

Fire Inspections Per 1,000 Population

42
43

Chattanooga
12 City Average

Cost Per Calls For Service

$2,468
$2,504

Chattanooga
12 City Average

Percentage of Fire Code Violations Cleared in 90 Days

91.38%
92.95%

Chattanooga
12 City Average

Percentage of Structure Fires Where Cause is Determined

76%
81%

Chattanooga
12 City Average
FIRE CHARTS-CITIES OVER 100,000 POPULATION

OVER 100,000 POPULATION CITIES COMPARED TO AVERAGE

- **Fire Services Cost Per 1,000 Population**
  - Chattanooga: $152,277
  - 3 City Average: $130,519

- **Calls For Fire Services Per 1,000 Population**
  - Chattanooga: 62
  - 3 City Average: 94

- **Fire Inspections Per 1,000 Population**
  - Chattanooga: 42
  - 3 City Average: 26

- **Cost Per Calls For Service**
  - Chattanooga: $2,468
  - 3 City Average: $1,775

- **Percentage of Fire Code Violations Cleared in 90 Days**
  - Chattanooga: 91.38%
  - 3 City Average: 95.46%

- **Percentage of Structure Fires Where Cause is Determined**
  - Chattanooga: 76%
  - 3 City Average: 63%

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT
## KNOXVILLE

### City Profile

Population: 173,890

Land Area 100 sq. mi.

### Calls For Service:
- Emergency Calls: 29,364
- Fire Calls: 6,453
- Structure Fires: 437

### FTE Positions:
- 333

### Fire Inspections:
- 4,161

### Fire Code Violations:
- 2,165

### Conditions Affecting Service, Performance, and Cost

<table>
<thead>
<tr>
<th>Description</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Population</td>
<td>173,890</td>
</tr>
<tr>
<td>Land Area</td>
<td>100 sq. mi.</td>
</tr>
<tr>
<td>Calls For Service</td>
<td>29,408</td>
</tr>
<tr>
<td>Emergency Calls</td>
<td>29,364</td>
</tr>
<tr>
<td>Fire Calls</td>
<td>6,453</td>
</tr>
<tr>
<td>Structure Fires</td>
<td>437</td>
</tr>
<tr>
<td>FTE Positions</td>
<td>333</td>
</tr>
<tr>
<td>Fire Inspections</td>
<td>4,161</td>
</tr>
<tr>
<td>Fire Code Violations</td>
<td>2,165</td>
</tr>
<tr>
<td>Fire Code Violations Cleared Within 90 Days</td>
<td>98%</td>
</tr>
<tr>
<td>Response Time</td>
<td>3:25</td>
</tr>
<tr>
<td>EMS Level</td>
<td>ALS</td>
</tr>
<tr>
<td>EMS Calls</td>
<td>11,013</td>
</tr>
</tbody>
</table>

### Explanatory Information

#### Service Level and Delivery

Knoxville operates a full-service fire department and provides almost all of the services offered in any fire department in the state.

#### Conditions Affecting Service, Performance, and Cost

None
FIRE CHARTS - ALL CITIES

ALL CITIES COMPARED TO AVERAGE

Fire Services Cost Per 1,000 Population

$200,000
$150,000
$100,000
$50,000
$0

$136,805
$134,478

Knoxville
12 City Average

ALL CITIES COMPARED TO AVERAGE

Structure Fire Per 1,000 Population

3.0
2.0
1.0
0.0

2.5
1.4

Knoxville
12 City Average

ALL CITIES COMPARED TO AVERAGE

Calls For Fire Services Per 1,000 Population

200
150
100
50
0

169
76

Knoxville
12 City Average

ALL CITIES COMPARED TO AVERAGE

Average Response Time

6.00
5.00
4.00
3.00
2.00
1.00
0.00

3:25
4:18

Knoxville
12 City Average

ALL CITIES COMPARED TO AVERAGE

Fire Inspections Per 1,000 Population

200
150
100
50
0

24
43

Knoxville
12 City Average

ALL CITIES COMPARED TO AVERAGE

Cost Per Calls For Service

8000
6000
4000
2000
0

$809
$2,504

Knoxville
12 City Average

ALL CITIES COMPARED TO AVERAGE

Percentage of Fire Code Violations Cleared in 90 Days

100.00%
75.00%
50.00%
25.00%
0.00%

98.00%
92.95%

Knoxville
12 City Average

ALL CITIES COMPARED TO AVERAGE

Percentage of Structure Fires Where Cause is Determined

100%
75%
50%
25%
0%

34%
81%

Knoxville
12 City Average

TENNESSEE MUNICIPAL BENCHMARKING PROJECT
FY 2003 ANNUAL REPORT

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