Research Brief

State and Local Government: The Perfect Storm

Abstract: Several issues threaten the proper expansion of information technology development by state and local government organizations. Gartner Dataquest recommends new technology management strategies.

By Rishi Sood

Recommendations

- State and local government organizations must continue to promote the need for effective governance and evangelize the focus on enterprise architecture, IT standards and interoperability.

- Given upcoming technology skill shortages, state and local governments must take inventory of current skill sets, align competencies with key organizational missions and identify areas that can be consolidated and outsourced.

- Public sector organizations must look to facilitate interagency cooperation, create incentives for data sharing and revise funding barriers to meet the operational objectives of homeland security, service to the citizen and enterprise government.

- Newer procurement methodologies, such as BVIT and TVO, must be embedded in the decision-making process for upcoming technology initiatives.
Introduction

Technology has made significant strides within state and local governments. The advances and progress from Y2K development, e-government and CIOs that reported directly to the governor have had a profound impact on the increased visibility of government technology. In many respects, technology is now a strategic weapon that defines governors, attracts businesses and retains citizens.

Yet, as we move closer to 2003, there is a storm on the horizon. There are a number of new and recurring issues that threaten the advancement of government technology. This Research Brief examines some of these key challenges for state and local governments and provides recommendations on how to best weather the storm.

The Perfect Storm: Identifying the Challenges

State and local governments are facing a monumental challenge in the year ahead. The challenge is based on recent events (the 2002 elections and the economic slowdown) as well as on some underlying issues (recruitment and retention, and leadership continuity) that have been shaping technology strategies within state and local governments. Gartner Dataquest believes that the combination of these events is creating a challenge we call "the perfect storm." The name emphasizes similarities to the book and motion picture of the same name, which tell the story of the convergence of several storms into a single overpowering event.

Key components of the perfect storm include the following:

- The new-governor cycle — The beginning of 2003 will see a host of new state governors, county executives and city mayors. Figure 1 illustrates the new-governor landscape with an emphasis on the 24 new governors who will take office in 2003. This batch of new public sector CEOs will bring new priorities to their jurisdictions, with a significant impact on the operational and technology strategies for their organizations.

- Operational fact — In contrast to the perceived need for new technology, these new CEOs will embrace a number of other key issues in this post-Sept. 11 world including public safety, social services/job training and economic development. Consequently, technology once again will need to compete for attention and funding with the more traditional areas of public sector services.

- Key technology impact — Recent research suggests that the projects that will get the go-ahead in this new market environment will be IT solutions that help generate revenue (integrated tax systems and red light runners), manage costs (enterprise resource planning and decision support) and help harden the infrastructure (security, business continuity and so on).
Projected budget deficits — The National Association of State Budget Officers project a combined budget deficit of $75 billion for the states. All 50 states face a significant budget crisis in 2003 and into 2004. As shown in Figure 2, some of the most serious challenges include California ($23 billion), New York ($6 billion), New Jersey ($6 billion), Texas ($1.5 billion) and Maryland ($1.2 billion).

Operational fact — To balance budgets, governments must decrease operational expenditures and services, increase taxes, tap rainy-day funds and advance tobacco-settlement-related money.

Key technology impact — Although the fiscal crisis will curtail the growth of IT spending in 2003, structural and contractual issues will keep total IT spending at or slightly above 2002 levels.
Internal skills shortage — State and local government managed information system (MIS) staffs are aging, and significant numbers of people are moving closer to retirement. In fact, Gartner Dataquest estimates that the average age of an MIS employee in state and local governments are 48.6 and 49.4 years old, respectively. Figure 3 highlights the aging government organization. Given these averages and statistics, a wave of retirements from public sector MIS staffs is expected during the next five years, which could deplete internal resources by 20 percent or more.

Operational fact — Although the bursting of the dot-com bubble has created an opportunity for state and local government organizations to hire younger, skilled IT professionals, the rate at which new staff members are joining the public sector does not match anticipated retirement. Moreover, hiring replacements does not mitigate the ongoing problem of retaining and rewarding qualified MIS employees.

Key technology impact — State and local governments must focus on an internal audit of technology competencies, align skills with core services, and seek areas that may be better managed in an outsourced relationship.

Source: Gartner Dataquest (December 2002)
Figure 3
IT Skills Shortage: We All Turn Gray

<table>
<thead>
<tr>
<th>Age Group</th>
<th>Percent</th>
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<tbody>
<tr>
<td>20-30</td>
<td>5</td>
</tr>
<tr>
<td>30-40</td>
<td>15</td>
</tr>
<tr>
<td>40-50</td>
<td>45</td>
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<td>50-60</td>
<td>35</td>
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Source: Gartner Dataquest (December 2002)

- Departures of state CIOs — In many respects, a lack of stable leadership continues among the chief technology executives within state organizations. Over the past three years, more than 15 state CIOs have left office, vacating key positions that would otherwise set the long-term strategic focus of technology implementation and foster cooperation across the enterprise.

- Operational fact — The previous round of voluntary departures of state CIOs will now be exacerbated by forced departures of other CIOs as new governors appoint new technology leaders. Gartner Dataquest estimates at least 12 CIO positions will become vacant during the next 12 months. Others have projected that this figure may reach 20.

- Key technology impact — Despite recent advances with respect to Y2K-related implementation, elevation of the state CIO position and new e-government activities, the lack of continuity in the chief strategic technology leader may hamper the momentum and focus on critical issues such as effective governance, enterprise architecture and business process coordination.

All of these issues are key components of the perfect storm that state and local government organizations will face in 2003. Gartner Dataquest believes that these components have the strength to undermine the waves of technology advancement within public sector organizations and tear at the fabric future development. Figure 4 summarizes the key elements of this storm ahead as well as highlights the other major operational issue in 2003, homeland security.
Given the perfect storm looming on the horizon, state and local government organizations must prepare themselves to weather the key issues in 2003 and beyond. In particular, Gartner Dataquest believes that public sector organizations must adhere to new technology strategies that will help mitigate the immediate problems and best equip organizations with the tools and frameworks to resolve critical issues over the long term.

The following are key user recommendations:

- Consolidate technology resources. In many respects, state and local governments have overinvested in technology, with individual agencies having separate data centers and server farms. This excess bandwidth should be consolidated to more efficiently utilize resources.

- Initiate cost recovery measures. In some cases, the excess capacity and bandwidth has mushroomed into areas in which governments are paying for resources (circuits and desktops) that no one is using (because of retirement and realignment) or have created unnecessary duplication between levels of government. Cost recovery measures can help identify these areas, and find the right size for the organizational outlay and the level of government that should be responsible for payment.

- Identify areas for strategic outsourcing. Given the coming wave of retirement, public sector CIOs must take inventory of current skill sets, align competencies with organizational missions and identify areas to
be outsourced. This may provide the best assessment of “insourcing” capabilities and demonstrates the tangible costs of technology management.

- Evangelize the need for effective governance, enterprise architecture, interoperability and standardization. Constrained fiscal environments often lead the rich and poor agency segments in separate directions, which have fostered the stovepiped and siloed nature of technology implementation. Effective governance, enterprise architecture, interoperability and standardization are fundamental requirements to help keep the organization together and better prepare for the next downturn.

- Create incentives for data sharing and interagency cooperation. Moreover, stovepiped and siloed technology development has been fostered by the funding methods, legislative barriers, and turf battles that exist among public sector organizations. New CEOs, legislators, and CIOs must look to revise this flawed approach and create new incentives for greater interagency data sharing and cooperation and technology planning.

- Procure technology based on the business value of IT (BVIT) implementation. Gartner Dataquest recommends that public sector CIOs begin to utilize newer procurement methodologies, such as BVIT, total value of operations (TVO) to more accurately measure the value of new technology development (see Figure 5).

**Figure 5**  
**Technology Strategies**

<table>
<thead>
<tr>
<th>Old World</th>
<th>Vs.</th>
<th>New World</th>
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<tbody>
<tr>
<td>Duplicate Technology Investments</td>
<td>Consolidation of Technology Resources</td>
<td></td>
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<tr>
<td>Reliance on Internal MIS</td>
<td>Strategically Outsource</td>
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<td>Independent Agency Technology Planning</td>
<td>Government Model and Enterprise Architecture</td>
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<td>Siloed Program Development</td>
<td>Interoperability and Standardization</td>
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<td>TCO- and ROI-Based Procurement</td>
<td>BVIT- and TVO-Based Procurement</td>
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<td></td>
<td>Data Sharing and Interagency Cooperation</td>
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TCO=total cost of ownership; ROI=return on investment.  
Source: Gartner Dataquest (December 2002)
**Key Issue**

What are the leading business trends and technology drivers in this industry?