Instant access to secure information is critical for senior executives to make decisions. For U.S. government executives, the quality of these decisions affects the security of citizens and the effectiveness of an entire agency’s mission performance.

As U.S. government executives and their staff have adopted mobile devices including smartphones and tablets in their personal lives, they have begun to see the potential to advance their professional effectiveness using these same tools. As a result, CIO organizations in almost every Federal agency are responding to requests for secure, anytime, anywhere access to critical government data via mobile applications.
It is challenging for agencies to balance the demands of security standards with the inherent business needs of an increasingly remote workforce. A skilled team of cross-disciplined professionals with deep domain expertise is needed to support the technical constraints of secure mobile application development and to align application outcomes to an agency’s desired performance standards.

Acuity’s Information Management practice has developed repeatable application development methodologies, security frameworks and cost-effective application development approaches to assist Federal agencies as they adopt new mobile platforms.

Acuity implements government mobility by supporting: Mobile Application Development, Data and Device Security, and Application Design and Governance.

Mobile Application Development

Mobile applications developed for Apple’s iPhone/iPad and other mobile platforms require new development skills, and mobile developers must contemplate advanced security controls and constrained application resources such as limitations on memory and network connectivity.

In response, Acuity deploys a repeatable mobile application development methodology. This approach enables Federal agencies to develop mobile applications using web-based technologies including HTML 5, CSS and JavaScript. By aligning modern application development tools with the more traditional, federally-accepted software development processes, Acuity maximizes on the benefits of each -- lowering barriers to entry for agencies developing new mobile applications and simplifying the development and maintenance process over time. In addition, the use of these web-based technologies enables agencies to develop applications for multiple platforms so that they do not become locked into a specific vendor as the marketplace continues its rapid evolution.

Acuity’s mobile development professionals have experience integrating mobile applications with existing agency systems and IT infrastructure. This enables new mobile applications to seamlessly interface and display data from legacy systems that weren't initially designed with mobile device compatibility in mind. Extending existing enterprise systems to mobile platforms increases their lifespan and creates new opportunities to use legacy systems and their data without significant redesign investment.

President Obama asked all government agencies to prioritize the creation of mobile applications in 2013 “to make a real difference in people’s lives” in his 2012 Digital Government Strategy. Acuity’s real-world experience with cabinet-level applications creates a portal for secure and versatile access to resources that keep the U.S. government and its citizens effectively moving forward.
Data and Device Security

To effectively deploy mobile applications for government, agency leaders must account for data security in three separate locations: on the device, across the network and within the mobile application. Acuity has developed a security framework for mobile devices and applications that enables government agencies to secure their data in transit and at rest. The security framework is the cumulative work of successfully deploying mobile applications containing data at the Sensitive But Unclassified (SBU) level to cabinet-level clients. Acuity:

**Device Security Controls**
Applies device security controls and usage policies at the device level through the use of Mobile Device Management (MDM) software. Device-level security controls often include password protection, disabled access to non-enterprise applications and non-essential device functionality, controlled network connectivity and the installation or enablement of centralized management controls including remote device tracking and data wiping capabilities. Acuity is knowledgeable of all leading MDM platforms and has developed reusable configuration guides for securing mobile devices.

**Network Transport Layer**
Secures the Network Transport Layer to protect data in transit between the device and the government’s network. A number of open source and commercially available security tools can be used to implement network security controls. In fact, agencies are often able to leverage existing investments in VPN solutions that have been deployed for telework initiatives. Acuity partners with clients to ensure an open dialogue with the agency’s information assurance professionals to determine the most cost-effective and secure-networking approach for each unique circumstance.

**Application-Level Security**
Integrates application-level security to secure data at rest on the device by encapsulating it within an encrypted application container. However, there are many components in a typical mobile application that could result in the unintentional exposure to sensitive data. Acuity developers plan for data storage at rest, data input validation and side channel leakage potential in order to comprehensively and proactively address application-level security controls.

With this framework, agency IT organizations are able to demonstrate that they are meeting the information assurance guidelines and controls necessary for their specific application and data needs, facilitating faster program reviews and launching approval timelines.

Mobile Application Design and Governance

Mobile application design requires agencies to place an intense focus on user involvement throughout the design and development process. Ease of use and effective touch-screen interfaces are functional requirements for all mobile applications.

Mobile application users are not likely to consult a user guide when accessing a new program. Mobile interfaces must be intuitive and provide contextual awareness to help the user directly within the resource itself.

Acuity has proven experience leveraging Agile software development methodologies to implement mobile applications for government and integrates these processes with the traditional agency control gates for enterprise software development. Acuity uses rapid prototyping, iterative development and continuous customer involvement and other Agile approaches to develop effective mobile applications with high user adoption.

Agile development processes enable developers to interact with customers frequently to obtain feedback throughout the development process and to improve the design and usability of the resulting application. An iterative development process enables agencies to see progress rapidly and helps secure the agency’s investment by reducing the risk of an application not meeting the program goals.

“We’re reaching an inflection point. It’s no longer about, are you carrying a mobile device or are you using a computer; it’s about what size screen are you accessing resources on. We’re taking an approach that says everything will wind up being mobile in some way,” Federal CIO Steven VanRoekel said.
For more information on Acuity’s Mobile Solutions for Government, past performance and security methodologies, please contact:

BD@myacuity.com
703-766-0977

About Acuity

Acuity is a management and technology consulting firm to clients in the Federal, State & Local Government, Higher Education, Healthcare and General Business. Acuity provides IT strategy, architecture and design, mobile applications, custom software development, program management and IT operations management solutions to help clients achieve real, measurable results. Visit www.myacuity.com for more information.

Acuity’s Management and IT Consulting Services are aligned to help you assess, plan and design your governance and management capabilities in support of your stakeholder requirements and business objectives. The technology industry is driven by constant innovation and rapid change. Acuity helps you identify opportunities to reduce cost, reduce risk and provide improved quality and greater business value. We call this our “PLAN.PERFORM.SAVE.” services framework, leading our clients to greater operational efficiency by achieving more mission for less.