

# Achieving ADA Compliance in the Cloud

After the Civil War, Congress created the Antideficiency Act (ADA) to rein in ballooning government debt and solidify its role in controlling the spend of taxpayer dollars. The ADA limits the Executive Branch to spending only what Congress authorized for a fiscal year.

Nearly two centuries later, the ADA is a major consideration as federal Government organizations plan their migration to the public cloud because:

- The ADA prohibits obligating or spending money before it's received from Congress and prohibits taking money given for one purpose and using it for another.
- Violations of the ADA fall into three categories: Purpose (what contracts/ programs an agency may fund as defined in appropriations), Time (how long money is available to fund the contract/program), and Amount (how much an agency can spend on a contract/program).<sup>1</sup>
- The ADA is unique among fiscal statutes in U.S. law because federal employees can be held personally responsible for spending money not approved by Congress and face potential criminal penalties and administrative sanctions for violations.

## How a 19th Century Law Impacts Your Cloud Usage

Here's how an act that was created to control the purchase of muskets and swords impacts a Government agency's migration to the cloud.

Think of cloud usage and billing like your home electricity: available on-demand and billed based on consumption. Now, imagine that access to the electricity in your home is available to everyone in your neighborhood. Your doors are wide open for people to enter your house and turn on lights, air conditioning, appliances, etc.

To maintain some control, you need to manage their access to your house, limit their access to only approved appliances, and monitor the electric meter to ensure they don't exceed the household budget you've established. If you exceed your budget – or use an underfunded account to pay a bill – you could face a fine or imprisonment.

Rapid creation and use of cloud accounts without business alignment, proper configuration, and enforcement puts agencies and personnel at risk of violating the ADA.



The power of the purse "is Congress's most jealously guarded authority and likely the strongest check against the power of the executive branch."<sup>2</sup>

1: Golden Rules of Fiscal Law - <https://blogs.duanemorris.com/governmentcontractslaw/2015/03/06/golden-rules-of-fiscal-law-purpose-time-amount>

2: The Antideficiency Act: A Primer - <https://www.americanactionforum.org/research/antideficiency-act-primer>

# Unique Challenges of ADA Compliance in the Cloud

Government agencies are rightly concerned when it comes to ADA compliance and cloud usage. The hallmarks of the cloud — decentralized account creation, variable and pay-as-you-go usage, and quick pay cycles — create budget challenges. Each cloud resource ordered commits the government to paying for the resource, and costs accrue upon request and deployment.

For fiscal year 2017, there were 16 violations of the ADA, ranging in reported amounts from several thousand to millions of dollars.<sup>3</sup> Typical funding mechanisms — like not-to-exceed Contract Line Item Numbers (CLINs) and drawdown accounts — defeat the beneficial elasticity of the cloud by prohibiting service ramp up or down and introducing burdensome bookkeeping to track usage. Agencies also struggle with less-than-ideal techniques to combat sprawl and the inherent variability of the cloud, such as:

- Using traditional IT management methodologies to control access to cloud service provider (CSP) services through a central group with a rigid approval process and manual setup for accounts and resources. This approach fails to scale as the number of users and accounts grows.
- Allowing unfettered, decentralized access to CSPs across multiple unconnected accounts. This allows usage to scale but reduces leadership visibility and creates unacceptable compliance and financial risk.
- Using a cloud broker, which gives a measure of scalability and visibility improvement, but substantially abstracts the services available from CSPs to a minimal set of compute, storage, and network services. In addition, cloud brokers cannot keep up with the rate of new services introduced by the CSPs.

Agencies need a cloud governance solution that delivers native access to cloud resources and the ability to consume and pay for these resources in compliance with the ADA.

## How Kion Delivers ADA Compliance

Most CSPs provide some services that can be used to build a governance solution, but implementing an effective solution requires significant investment and cloud engineering expertise to assemble the right services. And CSPs don't support stopping spend when budgets are reached — a key need in maintaining ADA compliance.

Kion provides a simple, intuitive, and affordable cloud governance solution.

## Success Story: Ensuring ADA Compliance with Kion

Kion is helping a large US Government agency give controlled access to the cloud to thousands of engineers. This agency created a next-generation software development environment within Amazon Web Services (AWS) and saw an immediate increase in their ability to build and deploy innovative solutions. They also identified several challenges to overcome



Acquisition officers "are faced with trying to buy commercial cloud capabilities with a model that was designed to buy bolts and pencils and paper."<sup>4</sup>

3: Antideficiency Act Reports – Fiscal Year 2017 - 4 <https://www.gao.gov/assets/690/688415.pdf>

4: Does Buying Cloud Services Have to Be This Hard? - <https://fcw.com/articles/2017/05/08/cloud-acquisition-schneider.aspx>

when the initial success of the environment generated interest from nearly 20K developers lining up to get access for their projects. When scaling access across such a large user community, contracting officers and financial leaders had major concerns with the environment.

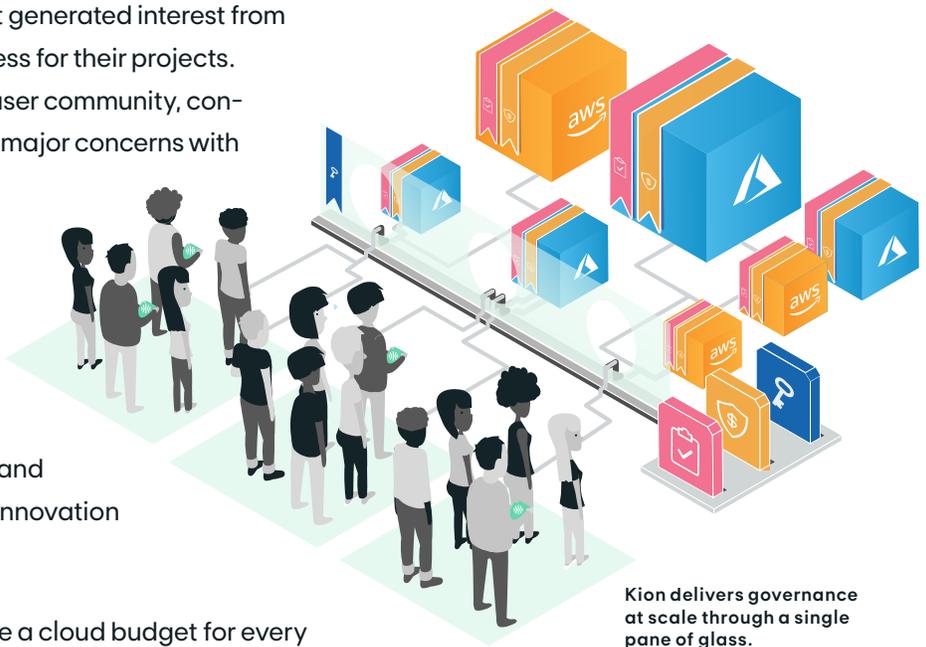
By allowing users the autonomy they needed to create and manage their cloud resources, cost overruns were very likely.

Alternately, requiring approval for every action that incurred a cost wouldn't scale and the end user experience would lessen the innovation potential.

Using Kion, the agency can set and enforce a cloud budget for every project. And because Kion monitors spend within each AWS account in near real time instead of every 12 hours like the native capabilities of AWS, the agency can more rapidly respond to spending issues. Actions are set to first notify users if they're at risk of exhausting their budget. If those alerts are ignored and spending continues to increase, more intrusive actions can freeze spend, preventing users from creating new cloud resources.

Finally, if the budget is completely exhausted, Kion can be configured to automatically archive projects and terminate cloud resources. Kion ensures this agency maintains established budgets at scale and stays compliant with the ADA.

Being in the cloud doesn't have to mean your doors are wide open. Implementing a solid governance foundation with Kion ensures your agency minimizes budget, compliance, and security risk – and stays on the right side of the ADA.



Kion delivers governance at scale through a single pane of glass.

## Kion Features

### AUTOMATION & ORCHESTRATION

- Centralized management of all cloud accounts and resources aligned to your organization's hierarchy
- Federated single sign-on and MFA for secure access to the cloud console
- Automated, self-service account creation with native console, CLI, and API access

### FINANCIAL MANAGEMENT

- Align your organization's cloud workloads with your internal budgeting process and cost centers
- Configurable financial enforcements to send alerts and freeze spending when project spending thresholds are exceeded
- Savings opportunities to identify and reduce money-wasting resources

### CONTINUOUS COMPLIANCE

- Robust inheritable access policies to restrict use of non-compliant cloud services
- Enforcement of security policies across the organization
- Real-time findings to report the compliance gap and automatic or on-demand remediation to make corporate audits easier