



## Executive Brief – 2025 ITCS Annual Report

### Key Accomplishments and Successes

- Completed a comprehensive core network overhaul, including new core switches and ACL-based segmentation for enhanced security.
- Migrated all County devices to Windows 11, replacing hardware as needed.
- Implemented multiple fiber connectivity projects to improve reliability and redundancy.
- Supported public safety initiatives, including camera installations for the Village of Waverly Police Department and license plate reader deployment.
- Restructured annual cybersecurity training using KnowBe4 and conducted quarterly phishing simulations.
- Began migration of Shared Services to Office 365 for unified collaboration.
- Modernized applications, including ATC tax system consolidation, Real Property Data Viewer migration to the cloud, and Motorola FLEX CAD upgrade.
- GIS Division released Tioga County One Map and processed over 2,200 parcel transactions, adding \$1.4M to the tax roll.

### Major Challenges

- Staff shortages with key positions (Network Administrator, Office Specialist, Deputy Director) vacant for much of the year.
- Technical issues related to Microsoft directives and failed patches requiring extensive troubleshooting.
- Increase in phishing and vishing attempts, highlighting the need for stronger cybersecurity measures.

### Ongoing Priorities and Goals for 2026

- Complete Office 365 migration for all Shared Services in Q1 2026.
- Advance cybersecurity posture through penetration testing, SIEM logging tools, and modern authentication standards.
- Fill key staffing positions to restore full operational capacity.
- Upgrade network closets to current standards and replace aging copiers.
- Expand Shared Services with Towns of Spencer and Newark Valley pending catalog approval.
- Plan and initiate major projects including a new County phone system, migration to NinjaONE ticketing platform, SCADA system upgrade for Town of Nichols, and website redesign by 2027.

## ITCS Annual Report – 2025

In 2025, the County's Information Technology and Communications Services Department completed several projects as it continued to assist the County through a significant period of transition. Key milestones achieved this past year include:

### Key Achievements:

- **Core Network Upgrade**
  - In 2025, the ITCS Department completed a comprehensive overhaul of the County's core network infrastructure. This initiative included the procurement and deployment of new core switching devices, as well as the implementation of additional network segments secured with Access Control Lists (ACLs). These enhancements provide greater segmentation and restrict unauthorized traffic across the network, significantly improving security and overall network performance.
  
- **Windows 11 Upgrade**
  - The ITCS department was tasked with migrating all Windows 10 devices to Windows 11. Windows 10 reached an End-of-Life status on October 2025.
  - Multiple devices had to be replaced to accommodate the Hardware requirements for Windows 11.
  
- **Board of Elections VPN Upgrade**
  - ITCS department worked with the NYS-BOEIT Department to upgrade the VPN connection between the State Board of Elections and Tioga County BOE.
  
- **Tioga County Public Safety Patrol License Plate Reader**
  - ITCS Department was tasked with working with Motorola to assist in setting up and installing a single License plate reader for one of the Sheiff Patrol Cars.
  
- **Fiber upgrades for County Radio Project**
  - In 2025, the ITCS Department partnered with STN and Upstate Pole on multiple fiber projects to enhance connectivity between key County facilities. These projects included establishing fiber links between the Public Safety Building and the Carmichael Hill Tower.
  - Additionally, direct fiber paths were installed between 56 Main Street and the Public Safety Building, as well as between Health and Human Services and 56 Main Street. These upgrades provide redundant backup paths and improve the overall fiber infrastructure, ensuring greater reliability and resiliency for critical County operations.
  
- **Dental Van Network Upgrade**
  - In 2024, the Dental Van underwent a technology upgrade to enable reliable internet connectivity. Building on that foundation, in 2025 the ITCS Department expanded the solution to provide a stronger VPN connection back to the County network. Additionally, ITCS integrated support for a new physical security system installed on the van, ensuring enhanced security and connectivity for mobile operations
  
- **HVAC Network**
  - In 2025, the County completed a major overhaul of multiple HVAC systems, all of which require network connectivity for centralized control. To support this, the ITCS Department designed and implemented a dedicated network specifically for managing these critical systems. By isolating HVAC operations on a separate network, ITCS significantly mitigates

cybersecurity risks while ensuring reliable performance and secure management of essential infrastructure.

- **Village of Waverly Police Department Grant Project - Part 1**
  - In 2024, the Village of Waverly Police Department partnered with the ITCS Department to enhance its IT infrastructure and improve public safety visibility in critical areas across the Village. The Village was awarded a grant, and Phase 1 of the project began in 2025 with upgrading all desktops at the Police Department.
  - The ITCS Department assisted with the procurement and installation of the Village of Waverly's camera system as part of the grant initiative.
  - Additionally, ITCS supported the procurement and installation of multiple public-facing cameras throughout the Village to increase public safety visibility.
  
- **Treasure ATC Migration**
  - The ATC application, used by the Treasurer's Office to manage County property taxes, was consolidated onto a single server to improve management and processing efficiency. The ITCS Department also partnered with the vendor to deploy software updates, ensuring the application remains secure and optimized for performance.
  
- **Shared Services Microsoft Office 365 Migration**
  - In 2025, Microsoft announced a transition to a subscription-only model for Exchange Server. In response, the ITCS Department directed all Shared Services to migrate to Office 365. The County has successfully operated on Office 365 for several years, and aligning Shared Services to the same platform eliminates the need to maintain multiple systems. This strategic move enhances efficiency, reduces complexity, and supports a more unified and collaborative shared services environment.
  
- **Annual Cyber Security Training**
  - In 2025, the annual Cybersecurity training program was completely restructured and delivered through KnowBe4, the County's designated training platform. To further strengthen cybersecurity resilience, quarterly phishing simulation campaigns were conducted, providing employees with practical experience in identifying and responding to potential threats. These initiatives reflect the County's ongoing commitment to safeguarding information and maintaining a strong security posture.
  
- **Helpdesk Report**
  - In 2025 the ITCS Department Served 3288 Tickets averaging 13 new tickets daily, with an average first response resolved of 88% and a resolution SLA compliance of 93% based on ITIL Standards.
  
- **Real Property Data Viewer**
  - The ITCS Department worked with a company called Beacon to migrate the Real Property data viewer application from within the county infrastructure to a cloud-based solution. The application allows the public to look up property information to include full market values, district information, and other property information. It went live and the county was able to decommission the old system.

- **Appointment of Chief Information Officer**
  - The ITCS Department in 2025 had a few open positions. In 2025 the County Legislature appointed Deputy Director Brandon Clark to Chief Information Officer.
  
- **NY Court Migrations**
  - The Tioga IT department coordinated with the Town of Owego to migrate their data to a separate network. This allowed the court to receive support from NYS since they were NYS managed computers and software.
  - Later in the year, the Town of Barton, Village of Waverly and Town of Owego court emails were migrated to their NYCourt.gov email addresses with forwarding rules set up so that their content would be separate from the county network.
  
- **Traverse Data Sync for Department of Social Services**
  - The IT department was able to move their check production and Traverse data sync to a newer server with better security protocols. We also worked with Traverse's vendor to re-set up the sync process on the new server.
  
- **County Clerk Tyler Migration**
  - ITCS staff coordinated efforts with the County Clerk's office to provide Tyler Technologies copies of the Cott Systems database to migrate services to Tyler Technologies. This is a multi-year project led by the Clerk's office.
  
- **Motorola FLEX Upgrade**
  - ITCS Staff completed a major upgrade to Motorola FLEX, the County's Computer Aided Dispatch (CAD) system. This update required collaboration between Motorola engineers, NYS network engineers, NYSP ITS staff, and County ITCS staff to ensure all FLEX was upgraded with all services restored within the scheduled maintenance window.
  
- **Traffic Diversion Program**
  - The Traffic Diversion program is used by the District Attorney's office that allows people who have received a traffic ticket an opportunity to have it dismissed. The custom-created application was rebuilt to SharePoint. This allows the DA to review the submitted information and then automatic emails are generated to the court and party based on outcomes of the work submitted.
  
- **Village of Owego Board Room Technology Overhaul**
  - The Village of Owego partnered with ITCS Department to modernize the boardroom at Village Hall by implementing a new desktop and audio setup to enable live streaming capabilities. ITCS provided end-to-end support for this initiative, including consultation, procurement, and full implementation of the project.
  
- **Tioga County Sheriff's Public Safety Camera Grant Project**
  - The ITCS Department supported the enhancement of security at the Public Safety Campus by assisting with the procurement of Verkada outdoor cameras to improve visibility and monitoring. In addition to procurement, the ITCS team successfully completed the installation of the cameras, ensuring a reliable and secure implementation

- **District Attorneys Board Room**
  - The ITCS Department was responsible for implementing technology in the District Attorney's new conference room. The team installed a 60-inch display, desktop computer, and phone system, while also ensuring wireless connectivity was available within the space. This upgrade provides a modern, efficient environment for meetings and collaboration.
  
- **Tioga County Dataset Accuracy -GIS**
  - The GIS Division the geospatial Processed 2,218 transactions in our parcel fabric system. All transactions are meticulously reviewed, processed and stored for analysis and assessment.
  - Lead agency for a vacant land analysis study completed for the County. Our efforts utilized a unique set of data inputs for a comprehensive review of land evaluations. This analysis resulted in an additional \$1.4 million in value on the county's tax roll.
  - Conducted an audit of the state-maintained road centerline data within the County. This dataset is critical for dispatching emergency services, determining state funding allocations for roadways, assisting with voter registration verification, and supporting a majority of publicly available Wayfinder applications. The GIS Division performed over 800 edits to this dataset and worked with municipalities to identify and correct additional local roadway defects such as road abandonments and dedications.
  
- **Tioga County One Map - GIS**
  - The GIS division created and released a public facing web app, *Tioga County One Map*, to replace our existing GIS Services web page. This online site is available to the public and is a one stop place to find geospatial content for Tioga County. The new web application provides enhanced user experience and allows us to continue to support the residents and businesses of the county by providing comprehensive geospatial data offerings. The GIS Division receives over 35,000 hits annually too its collection of web offerings with some daily traffic totals exceeding 200 users.
  
- **Town of Spencer Address point analysis - GIS**
  - The GIS Division provided large scale mapping and customized tabled reports to quantify the address points in need of verification while streamlining project management.
  
- **Village of Owego's Utility/Sewer Department – GIS**
  - The GIS Division created a GIS centric customized workflow for the Village of Owego's Utility/Sewer Department to enable asset management and inspection logging. This workflow is a huge upgrade from the current setup and is scalable for future operations.

### 2025 Challenges:

The ITCS Department faced several significant challenges throughout 2025. One of the primary obstacles was staffing shortages, with key positions including Network Administrator, Office Specialist, and Deputy Director remaining vacant for much of the year. These roles are critical to the department's operations, and their absence placed additional strain on existing resources. Looking ahead to 2026, we are focused on filling these positions to restore full operational capacity and strengthen departmental performance.

In addition to staffing challenges, the department navigated technical issues primarily related to Microsoft directives and failed patches, which required extensive troubleshooting and remediation efforts. Furthermore, we observed an increase in phishing attacks and vishing attempts targeting County systems and personnel. These trends underscore the growing importance of cybersecurity vigilance and proactive measures to protect County assets.

Despite these challenges, the ITCS Department remained committed to delivering reliable services and implementing strategic improvements. Our focus for 2026 includes addressing staffing gaps, enhancing security posture, and continuing to adapt to evolving technology requirements.

### Looking Ahead:

- **Migration of Shared Services to Office 365**
  - In 2025, the ITCS Department collaborated with each Shared Service to procure the appropriate licenses required for migrating their user base to Office 365. This strategic effort ensures consistency, improved collaboration, and streamlined management across all Shared Services. The migration process is scheduled for completion in Quarter 1 of 2026, marking a significant step toward a unified and modernized technology environment.
  
- **Advancing Cybersecurity in 2026**
  - The Tioga County ITCS Department remains committed to continuously advancing our cybersecurity posture. In 2026, we are planning several strategic initiatives to strengthen our defenses and adopt cutting-edge technologies. Key priorities include:
    - Penetration Testing – Conducting comprehensive assessments to identify and remediate potential vulnerabilities.
    - Enhanced Monitoring – Exploring advanced SIEM (Security Information and Event Management) logging tools and network management solutions to improve threat detection and response capabilities.
    - Collaborative Security – Leveraging joint operations and resources through the New York State Division of Homeland Security and Emergency Services to meet critical security objectives.
    - Modern Authentication Standards – Evaluating and implementing next-generation technologies to provide secure, user-friendly methods for network access.
  - These efforts reflect our proactive approach to cybersecurity and our dedication to safeguarding County systems against evolving threats. 2026 will be an exciting year as we adopt innovative solutions and set new standards for security excellence.
  
- **Copier Procurement**
  - Many of the County's existing copiers have reached End-of-Life status, creating challenges in reliability and support. In response, the ITCS Department has been tasked with identifying the most cost-effective and beneficial solution to replace these aging devices. This initiative will focus on improving efficiency, reducing maintenance costs, and ensuring that County departments have access to modern, reliable equipment to support daily operations.
  
- **Shared Services Catalog and Master Service Agreements**
  - Tioga County ITCS provides technology services to numerous municipalities through a shared services model. In 2025, the department began a strategic review to reclassify these services within formal contracts and the Catalog of Services, ensuring clarity, accountability, and mutual benefit for all participating entities.
  - With the rapid advancement of technology, particularly in areas such as cybersecurity and the increasing criticality of IT systems, these agreements must be carefully evaluated and updated to reflect current standards and best practices. This initiative will strengthen collaboration, improve service delivery, and ensure that shared services remain secure, efficient, and aligned with evolving technological needs.

- **Town of Spencer Shared and Town of Newark Valley Services**
  - The Town of Spencer and Newark Valley have expressed interest in joining the Tioga County ITCS shared services program under the new Catalog of Services. Initial discussions have taken place, and both parties are aligned to the benefits of this collaboration. Once the catalog receives legislative approval, we will move forward with formalizing the process.
  
- **Staffing**
  - As we move into 2026, the ITCS Department is prioritizing the recruitment and onboarding of key positions, including, Office Specialist, and Deputy Director. Filling these roles will restore full operational capacity, reduce strain on existing staff, and enable the department to deliver services more efficiently. With a complete team in place, ITCS will be better positioned to advance strategic initiatives, strengthen cybersecurity, and support the growing technological needs of Tioga County and its shared service partners.
  
- **Coroners Cohero Case Management System**
  - The ITCS Department collaborated with the Tioga County Coroners and the County Administrator's Office to secure a modern case management software solution for the coroners. In addition to implementing the software, ITCS is tasked with procuring standardized equipment for each Coroner to ensure consistency, reliability, and efficiency across all operations. This initiative reflects the County's commitment to leveraging technology to improve critical services and streamline processes.
  
- **Village of Waverly Camera Project Part 2**
  - Building on the progress made in 2025, the Tioga County ITCS Department will continue working with the Village of Waverly Police Department and its Department of Public Works (DPW) to complete the remaining components of the public safety camera project. In this next phase, ITCS will assist with the procurement of equipment required for the additional camera installations. While ITCS will provide technical support and guidance during setup, the installation of Phase 2 will be managed by the Village's DPW staff. This approach ensures the successful completion of the project while maintaining efficiency and cost-effectiveness.
  
- **Server Room Overhauls**
  - The ITCS Department recognizes the need to upgrade and modernize critical network rooms across the County. Over the next several years, the department will undertake a comprehensive rewiring of each network closet to meet today's industry standards. This initiative will improve reliability, enhance performance, and ensure the County's network infrastructure is prepared to support current and future technological demands.
  
- **Website Redesign**
  - A County website planning committee will be established in 2026. This committee will be responsible for reviewing our current website and making recommendations / requirements for a new County website. Anticipated rollout for a new County website will be Quarter 3 of 2027.
  
- **Migration to NinjaONE Ticketing System**
  - To reduce costs and improve efficiency, the ITCS Department is planning to leverage its existing remote management platform as the County's primary IT ticketing system. This transition will streamline support operations, consolidate tools, and provide a more

integrated approach to managing IT requests. The migration is scheduled for completion by October 2026, marking a significant step toward optimizing service delivery and resource utilization.

- **Town of Nichols Scada Project**

- The Town of Nichols has requested assistance from the Tioga County ITCS Department to support the upgrade of its SCADA systems in collaboration with the town's selected vendor. In 2026, ITCS will propose and finalize an agreement to provide technical support and guidance throughout the project. The Town of Nichols anticipates completing this upgrade by the end of Q3 2026, ensuring improved system reliability and operational efficiency for critical infrastructure.

- **County Phone System**

- Beginning in 2026, the ITCS Department will initiate the search for a new, modern phone system to replace the County's existing infrastructure. This project will be a significant undertaking in the coming years, impacting all Tioga County departments as well as shared service partners. The new system will not only improve internal communication but also enhance external connectivity, ensuring reliable and efficient contact with residents, businesses, and partner agencies.
- Phone technology has advanced substantially in recent years, offering features such as integrated video conferencing, mobile connectivity, and enhanced security protocols. These capabilities will allow the County to adopt a more unified and flexible communication platform that meets the demands of today's digital environment. The ITCS Department will begin by evaluating vendors and presenting options for this critical upgrade, positioning Tioga County to take full advantage of modern communication solutions.

## **Conclusion:**

The Tioga County ITCS Department achieved significant progress in 2025, delivering critical infrastructure upgrades, modernizing applications, and advancing cybersecurity initiatives. Key accomplishments included a comprehensive core network overhaul, migration to Windows 11, fiber connectivity enhancements, and major improvements in public safety technology. The department also streamlined operations through application consolidations, cloud migrations, and GIS innovations that improved data accuracy and accessibility.

Despite these successes, 2025 presented challenges, particularly staffing shortages in vital roles and technical issues related to Microsoft directives and failed patches.

Looking ahead to 2026, ITCS is committed to addressing these challenges and pursuing strategic priorities. These include completing the Office 365 migration for Shared Services, implementing advanced cybersecurity tools and penetration testing, filling key positions, and initiating major projects such as a new County phone system, network closet rewiring, and website redesign. The department will also expand shared services partnerships and continue leveraging technology to enhance efficiency, security, and service delivery across Tioga County.

Through these efforts, ITCS remains dedicated to supporting the County's mission, strengthening its technology foundation, and ensuring resilience in an evolving digital landscape.