Information Technology Steering Committee (ITSC) Meeting
December 19, 2024, 1:00 p.m.
1151 Punchbowl Street, Conference Room 410, Honolulu, Hawaii 96813

This meeting will be conducted remotely. Members of the public may participate via interactive conference technology (ICT) or in person at the physical meeting location indicated above.

[Click here to join the meeting](#)   **Or call in (audio only)** +1 808-829-4853,,401513076#
Meeting ID: 276 919 177 956   Phone Conference ID: 401 513 076#
Passcode: MPmgUP

AGENDA

I.   Call to Order; Roll Call

II.   Public Testimony

Individuals may provide oral testimony at the meeting or submit written testimony in advance, via e-mail to ets@hawaii.gov, Subject: *ITSC Testimony*, or deliver to
1151 Punchbowl Street, B10, Honolulu, HI, 96813. Oral testimony will be limited to three minutes per person or organization per agenda item.

III.   ITSC Governance

   a. Vice Chair Nomination and Vote

IV.   State Information Technology Strategic Plan Approval

V.   Legislative Updates

VI.   Mobile Application Update

   a. Senate Bill 2287 SD 2, HD 1, CD 1 (Act 82, 2024): Requires the Information Technology Steering Committee to assist the Chief Information Officer in developing a plan to enhance and increase usage of the hawaii.gov mobile application, the State's mobile internet application.

VII.   Technology Accessibility Update

VIII.   CIO Annual Report Update

IX.   Data and AI Strategy Update

X.   Hawaii Annual Code Challenge (HACC) Completion Update

XI.   Good of the Order

    a. Announcements
    b. Next Meeting: To be Determined

XII.   Adjournment

This interactive conference technology meeting will allow closed caption transcription to be activated by participants.

The ITSC meeting packet will be available at https://ets.hawaii.gov/it-steering-committee/.

Auxiliary Aid or Accommodation Due to a Disability
If you require an auxiliary aid/service or other accommodation due to a disability, contact Joanna Lee at (808) 586-6000 or email ets@hawaii.gov as soon as possible. Requests made as early as possible have a greater likelihood of being fulfilled. Upon request, this notice is available in alternate/accessible formats.

STATE OF HAWAI'I INFORMATION TECHNOLOGY STRATEGIC PLAN

State of Hawaii IT Strategic Plan 2025
Strategies and Goals

Vision
Transformative information and technology enriched government that serves all the people of Hawaiʻi and the ʻāina

Mission
Enable technology-enhanced, streamlined business processes, and decisions empowering the state's workforce to serve excellent outcomes for the constituents and the ʻāina

Optimize Process Efficiency
- Improve business relationship management
- Integrate departmental IT planning and IT budgeting
- Invest in business process improvement and automation
- Improve IT vendor contracts and project outcomes

Optimize the Responsible Use of Data & AI
- Protect privacy, ensure security and compliance
- Improve quality, accuracy and reliability
- Promote accessibility, transparency and inter-operability
- Ensure equity and ethically responsible use of data & AI

Improve System Modernization
- Improve IT service lifecycle management
- Manage IT architecture in each department
- Improve IT vendor delivery quality assurance
- Define architecture & technology standards

Enhance Cybersecurity Posture
- Protect critical infrastructure and data
- Promote inter-departmental collaboration & alignment
- Provide cybersecurity training and upskilling opportunities
- Define and implement minimum security standards

Maximize the Value of Shared Services
- Establish a collaborative statewide shared service strategy
- Develop cost-sharing approach for shared IT services
- Manage the statewide IT service catalog
- Enable an optimized ERP system to deliver business capabilities

Guiding Principles
- *Customer first*
- *Enterprise value & collaboration focus*
- *Fit for purpose*
- *Scalable & sustainable*
- *Evidence-based decision making*
- *Controlled technical diversity*
- *Managed security*
- *Compliance to laws and regulations*
- *Seek innovation & simplicity*

Workforce Development
- Improve HR process & talent acquisition
- Develop training, upskilling, & career pathing opportunities
- Modernize IT job classifications & pay scales
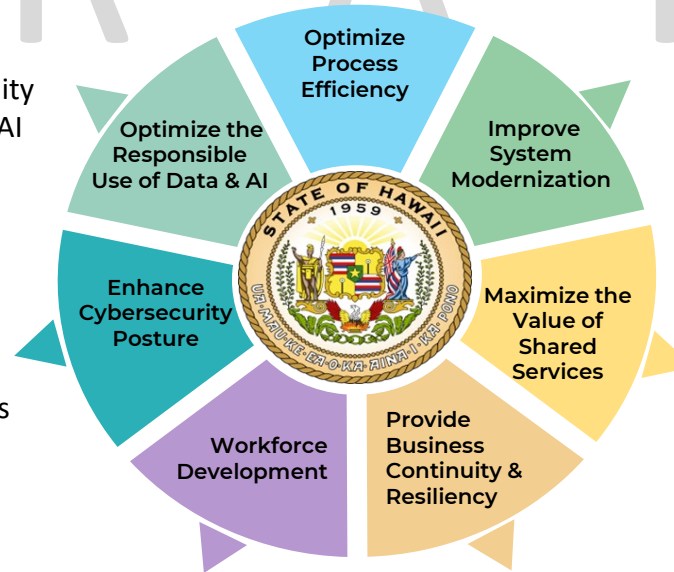- Develop long-term workforce planning

Provide Business Continuity & Resiliency
Identify & mitigate:
- Risks to end-of-life legacy applications
- Continuity risks to paper/non-digital processes
- Resiliency risks related to Internet connectivity
- Risks to recovery efforts

Strategic IT Drivers
- *Maximize the Use of Responsible AI*
- *Prioritize outcomes over features*
- *Streamline online & mobile citizen experience*
- *Zero-trust cybersecurity*

Contents

BACKGROUND, PURPOSE, METHODOLOGY

BACKGROUND

The Office of Enterprise Technology Services (ETS) was established by Hawaiʻi Revised Statutes §27-43 (HRS §27-43), and is a division of the Department of Accounting and General Services (DAGS). ETS is headed by a full-time chief information officer (CIO) to organize, manage, and oversee statewide information technology. The chief information officer is appointed by the Governor, serves on the Cabinet and reports directly to the Comptroller in DAGS. A key responsibility of the CIO is to develop, implement and manage the state information technology strategic plan (the IT Strategic Plan).

The first Hawaiʻi Information Technology Strategic Plan was developed in 2012 with input from diverse stakeholders including the ETS staff, leaders from departmental business and IT staff, and members of the community in accordance with HRS §27-43. HRS §27-43, requires the Strategic Plan to be updated once every four years and submitted to the Governor and legislature. The Plan was subsequently updated in 2019 and 2021 - with an update due in January 2025.

We would like to thank Governor Josh Green, M.D. for his support in guiding our state's technology efforts.

PURPOSE

The purpose of this Strategic Plan is to:

- Clearly articulate the State Information Technology future vision, mission, strategies, expected outcomes, major initiatives to achieve those strategies, and responsible owners for key plan elements.
- Establish a system for implementation of the plan over the next four years.
- Provide guidance to ETS and department IT organizations to help with alignment throughout the state.
- Create an instrument to support awareness and accountability for all parties to the strategic plan.
- Fulfill the requirement of Hawaiʻi Revised Statutes §27-43 and House Concurrent Resolution 94.

METHODOLOGY

An IT Strategy starts with understanding the business context. Alignment with state and department goals and priorities is a key success factor.

The State CIO sponsored a Business Context Discovery Workshop that was facilitated by Info-Tech Research Group. This took place from November 4th to November 8th 2024.

Interview sessions were held with 16 department leaders and staff to gather facts and information about their business priorities in the context of department missions. Through candid and open discussion, leaders shared their focus areas and challenges for the next 4-year planning horizon.

Several key business priorities emerged from these discussions:

- Deliver State Priorities & Department Services
- Improve Internal Department Efficiency
- Manage Department Technology Strategically
- Make Data-Driven Decisions
- Explore & Leverage AI Capabilities
- Leverage Enterprise Shared Services

Leveraging the *manaʻo* (meaning knowledge, belief) of department directors, the State CIO sponsored an IT Strategy workshop, held December 3rd to 6th 2024 and facilitated by Info-Tech, which brought IT leadership across the state together to reflect on Governor Green's priorities, the insights provided by departmental leadership, and the state's collective accomplishments toward achieving its current IT strategic plan. IT leadership worked together to identify new priorities and actions to advance the effective use of technology statewide in achieving its goals.

The result is the following updated IT Strategic Plan 2025, which outlines our core vision, mission and values for the State of Hawaiʻi information technology and our next actions for accomplishing these critical goals.

VISION, MISSION, CORE VALUES

VISION STATEMENT

Transformative information and technology-enriched government that serves all the people of Hawaiʻi and the ʻāina[1]

MISSION

Enable technology-enhanced, streamlined business processes, and decisions empowering the state's workforce to serve excellent outcomes for the people of Hawaiʻi and the ʻāina.

EMBODYING THE SPIRIT OF ALOHA

We strive to guide the Strategic Plan through the Aloha Spirit. In 1970, the definition of the "Aloha Spirit" was created by renowned poet, philosopher and treasured kupuna, Pilahi Paki at a Governor's Conference that included Hawaiian elders and non-Hawaiian civic leaders from across the state to grapple with issues facing Hawaiʻi at the time.   Pilahi Paki described the Aloha Spirit as the coordination between mind and heart within each person and are traits that express the charm, warmth and sincerity of Hawaiʻi's people. Pilahi Paki's definition of the Aloha Spirit was encoded into Hawaiʻi State law in 1986[2].   It is said that a person cannot do one of the principles without truly doing all and if you are not doing one, you are not doing any. So, to be "living ALOHA" is to live all of the principles.

Acronym	Word	Description
A	Akahai	To feel and to think with kindness
L	Lōkahi	To stand firmly in unity and harmony
O	Oluʻolu	To balance your thinking as well as your feelings
H	Haʻahaʻa	To be humble; humility expressed with modesty
A	Ahonui	To persevere; learn to apply patience; to be patient you learn to stand along

[1] The ʻāina (land) is not just soil, sand or dirt. The ʻāina is a heart issue for the people of Hawaiʻi. The very word ʻāina brings forth deep emotion evolved from ancestral times when people lived in nature as an integral part of it. We chose to incorporate the ethical, philosophical, and spiritual aspects not only present in the state's vision and mission statements, but also present in the culture that makes Hawaiʻi Hawaiʻi.

[2] Source of Aloha Spirit Hawaiʻi Revised Statutes HRS 0005-0007:
capitol.hawaii.gov/hrscurrent/Vol01_Ch0001-0042F/HRS0005/HRS_0005-0007_0005.htm

GUIDING PRINCIPLES

The Strategic Plan is guided by a set of principles that guide and support the operationalization of the Strategic Plan. The principles guide not only what the CIO, ETS and the Strategic Plan stakeholders choose to do, but also what they choose not to do.

Principle	Description
Customer First	We deliver the best experiences to our internal customers and external constituents with our services and products.
Enterprise value & collaboration focus	We aim to provide maximum long-term benefits to the enterprise as a whole while optimizing total costs of ownership and risks.
Fit for purpose	We maintain capability levels and create solutions that are fit for purpose without over engineering them.
Scalable & sustainable	We maximize reuse of existing assets. If we can't reuse, we procure externally. As a last resort, we build custom solutions.
Evidence-based decision making	We empower evidence decision making through the effective use of data and AI in compliance with our data and AI governance policy.
Controlled technical diversity	We control the variety of technology platforms we use.
Managed security	We manage security enterprise-wide in compliance with our security governance policy.
Compliance to laws and regulations	We operate in compliance with all applicable laws and regulations.
Seek innovation & simplicity	We challenge ourselves to use innovative technology to reduce complexity and take the benefit of emerging technologies.

We choose the simplest solutions and aim to reduce operational complexity of the enterprise.

IT STRATEGIES

Our IT Strategic Goals reflect the seven Strategies necessary to take full advantage of the state's investments and attain long-term success:

Strategy	Strategic Goals
Optimize Process Efficiency	• Improve business relationship management • Integrate departmental IT planning and IT budgeting • Invest in business process improvement and automation • Improve IT vendor contracts and project outcomes
Improve System Modernization	• Improve IT service lifecycle management • Manage IT architecture in each department • Improve IT vendor delivery quality assurance • Define architecture & technology standards
Maximize the Value of Shared Services	• Establish a collaborative statewide shared service strategy • Develop a cost-sharing approach for shared IT services • Manage the statewide IT service catalog • Enable an optimized ERP system to deliver business capabilities
Provide Business Continuity & Resiliency	Identify & mitigate: • Risks to end-of-life legacy applications • Continuity risks to paper/non-digital processes • Resiliency risks related to mainland connectivity • Risks to recovery efforts
Build a Modern IT Workforce	• Improve HR process & talent acquisition • Develop training, upskilling, & career pathing opportunities • Modernize IT job classifications & pay scales • Develop long-term workforce planning
Enhance Cybersecurity Protection	• Protect critical infrastructure and data • Promote inter-departmental collaboration & alignment • Provide cybersecurity training and upskilling opportunities • Define and implement minimum security standards
Optimize the Responsible Use of Data & AI	• Protect privacy, ensure security and compliance • Improve quality, accuracy and reliability • Promote accessibility, transparency and inter-operability • Ensure equity and ethically responsible use of data & AI

STRATEGY 1: Optimize Process Efficiency

GOAL 1.1: Improve business relationship management

Work towards better alignment of the state's business functions with IT. Budget for positions and vendor resources for bridging business and IT.

GOAL 1.2: Integrate departmental IT planning and IT budgeting

Ensure that all IT expenditures are closely aligned with the departmental strategic IT objectives to maximize expected benefits. Rank and select IT initiatives based on transparent expected benefits – as well as risks related to legacy technologies. Establish and enforce project portfolio management and benefits realization best practices.

GOAL 1.3: Invest in business process improvement and automation

Budget for establishing business process metrics and identification of sub-optimal processes for both constituent services and the state's internal support processes. Identify high-value processes as targets for process improvement and automation. Develop technology reference architectures for optimizing the state's internal processes and workflows.

GOAL 1.4: Improve IT vendor contracts and project outcomes

Enhance project outcomes by standardizing risk management across IT projects, improving vendor delivery quality, and prioritizing critical project management skills. Develop policy and guidelines for utilization of contract management and vendor performance management services.

STRATEGY 2: Improve System Modernization

GOAL 2.1: Improve IT service lifecycle management

Implement standardized IT service lifecycle frameworks. Invest in service lifecycle management tooling.

GOAL 2.2: Manage IT architecture in each department

Prioritize IT architecture management. Establish a resource plan for documenting current IT architecture as well as for planning and managing target state IT architecture.

GOAL 2.3: Improve IT vendor delivery quality assurance

Establish consistent criteria for evaluating the performance and delivery quality of IT vendors to ensure high standards. Streamline policy and practice for utilization of Independent Validation and Verification vendor contracts.

GOAL 2.4: Define architecture & technology standards

Establish technology reference architecture blueprints for the state's cloud-based IT modernization solutions. Establish policy and guidance for the use of reference architectures in IT budgeting and procurement.

STRATEGY 3: Maximize the Value of Shared Services

GOAL 3.1: Establish a collaborative statewide shared service strategy

Establish a working group and a plan for a statewide shared service strategy.

GOAL 3.2: Develop a cost-sharing approach to shared IT services

Design a transparent and equitable cost allocation framework that determines how expenses for shared IT services will be distributed among participating departments.

GOAL 3.3: Manage the statewide IT service catalog

Collaborate statewide to establish a centralized service catalog that clearly defines available shared IT services. Invest in appropriate tooling. Develop a process for continuously evaluating and improving service offerings.

GOAL: 3.4 Enable an optimized ERP system to deliver business capabilities

Invest in modernizing and optimizing the state's shared ERP system. Focus on integration, user accessibility, and scalability to meet evolving state needs.

STRATEGY 4: Provide Business Continuity & Resilience

GOAL 4.1: Identify & mitigate risks to end-of-life legacy applications

Improve the data quality and completeness of departmental application portfolios. Prioritize end-of-life applications for replacement or modernization based on their impact on critical services and associated risks.

GOAL 4.2: Identify & mitigate continuity risks to paper/non-digital processes

Prioritize analyzing dependencies on paper-based processes. Develop strategies to digitize and automate critical workflows, ensuring operational continuity during disasters or disruptions.

GOAL 4.3: Identify & mitigate resilience risks related to Internet connectivity

Robust internet connectivity is essential to ensuring uninterrupted operations, maintaining interoperable communications platforms, sustaining emergency support functions.

GOAL 4.4: Identify & mitigate risks to recovery efforts

Invest in developing a robust disaster recovery plan for all critical information systems.

STRATEGY 5: Workforce Development

GOAL 5.1: Improve HR process & talent acquisition

Optimize HR processes to attract top IT talent. Enhance recruitment strategies to fill critical skill gaps in the IT workforce.

GOAL 5.2: Develop training, upskilling, & career pathing opportunities

Improve the state's IT training and re-skilling to address current and emerging IT skills needs. Create career pathing opportunities to support employee growth and retention.

GOAL 5.3: Modernize IT job classifications & pay scales

Revise IT job classifications and pay scales to reflect market competitiveness and to attract high-caliber professionals.

GOAL 5.4: Develop long-term workforce planning

Create a long-term IT workforce strategy that anticipates future needs. Recognize the continuing shift towards Software as a Service and managed services – and plan for optimal state roles and skills needed.

STRATEGY 6: Enhance Cybersecurity Protection

GOAL 6.1: Protect critical infrastructure and data

Implement safeguards to protect assets, data, and systems required by department operations to mitigate risks. Integrate cybersecurity as a core component of a resilience strategy to prevent, withstand, and recover from cybersecurity incidents, system failures, and natural disasters.

GOAL 6.2: Promote inter-departmental collaboration & alignment

Develop a culture of shared responsibility to collaborate across all departments and align cybersecurity initiatives with business objectives so that measures are an enabler and not barrier to department goals.

GOAL 6.3: Provide cybersecurity training and upskilling opportunities

Train employees to recognize and respond to cybersecurity threats, equipping them with knowledge to adopt modern practices, and to stay current with emerging threats and technologies.

GOAL 6.4: Define and implement minimum security standards

Create a clear and enforceable set of security baselines to appropriately address needs of each department, measure the adoption of prescribed measures, and support remediation efforts to meet or exceed the baselines.

STRATEGY 7: Optimize the Responsible Use of Data & AI

GOAL 7.1: Protect privacy, ensure security and compliance

Create data classification and masking standards for all data and AI use. Protect data privacy according to Federal and State laws & regulations.

GOAL 7.2: Improve quality, accuracy and reliability

Establish standards, procedures and tools to manage and improve data quality. Define data and AI governance according to data quality to promote trust.

GOAL 7.3: Promote accessibility, transparency and inter-operability

Catalog state data and integrate master data to enable citizen-centric solutions. Establish data sharing standards and recommend tools to improve inter-operability. Identify owners of data set and AI use cases with clearly defined responsibilities. Update open data standards to ensure governance & transparency in data & AI use.

GOAL 7.4: Ensure equity and ethically responsible use of data & AI

Build data and AI governance framework to ensure equity throughout their lifecycle. Create an auditing mechanism to ensure equitable and ethical use in data and AI.

IMPLEMENTATION APPROACH

The statewide IT Strategy reflects the collective goals and initiatives of all departments toward a holistic approach to technology investment and management that delivers effective and efficient operations and services. The execution of the plan will occur through a combination of statewide IT governance and collaboration as well as individual departmental actions.

DEPARTMENTAL IT PLANS

A key aspect of the implementation of the state's overall IT strategy is stated in Section (4) of the Hawai'i Revised Statutes §27-43,

"The chief information officer shall work with each executive branch department and agency to develop and maintain its respective multi-year information technology strategic and tactical plans and road maps that are part of the State's overall information technology strategic plans, road maps, and directions."

It is essential to align the state's overall IT plan with each department's strategic and operational IT plans. With CIO's leadership, ETS and departments will work together to achieve this alignment – and establish living IT plans for all departments, and if deemed necessary, divisions and attached agencies as well.

IT STRATEGY WORKING GROUPS

Each of the seven IT Strategies shall have a Working Group to advance both the statewide governance of each IT Strategy and the implementation of the goals of each strategy within departmental IT plans.

CONCLUSION

The technology leadership of Hawai'i is committed to driving technological excellence and innovation. Our Strategic Plan outlines a clear path forward, focusing on enhancing foundational technologies, transforming legacy applications, delivering new business solutions, driving innovation, and investing in our employees.

Our proactive approach to innovation and close collaboration with our partner departments ensure that we are not only meeting current needs but also anticipating future challenges and opportunities. Through our commitment to operational readiness, resiliency and collaboration, we will continue to adapt to the evolving technology landscape and deliver high-quality digital services and business capabilities to our community.

MAHALO NUI LOA

We would like to extend a very special thanks to everyone who participated in our strategic planning process:

Name	Department	Name	Department
Keith Regan	Department of Accounting and General Services	Jade Butay	Dept. of Labor and Industrial Relations
Meoh-Leng Silliman	DAGS	Willian Kunstman	DLIR
Derek Sodetani	DAGS	Bennett Yap	DLIR
Jason Azus-Richardson	Dept. of Agriculture	Ryan Buillard	DLIR
Dexter Kishida	DOA	Ryan Kanaka`ole	Dept. of Land and Natural Resources
Anne Lopez	Dept. of the Attorney General	Lila Loos	DLNR
Garret Murayama	AG	Jordan Lowe	Dept. of Law Enforcement
Wayne Kouchi	AG	Brandon Asuka	DLE
Stuart Okumura	AG	Jared Redulla	DLE
Jian Zhu	AG	Malanie Martin	Dept. of Corrections and Rehabilitation
Matthew Dvonch	AG	Judy Yamada	DCR
Brenden Kinoshita	AG	Pamea Sturz	DCR
James Tokioka	Dept. of Business Economic Development and Tourism	Sanna Muñoz	DCR
Dane Wicker	DBEDT	Gary Suganuma	Dept. of Taxation
Wade Kamikawa	DBEDT	Corey Higa	DOTAX
Arthur Buto	DBEDT	Edwin Sniffen	Dept. of Transportation
Luis Salaveria	Dept. of Budget and Finance	Darren Cantrill	DOT
Sabrina Nasir	B&F	Keith Hayashi	Dept. of Education
Reid Moriyama	B&F	Michael Otsuji	DOE
Tracy Ban	B&F	Garrett Yoshimi	University of Hawaii
Keith Miyamoto	B&F	Christine Sakuda	Office of Enterprise Technology Services
Todd Nishida	B&F	Tom Ku	ETS
Nadine Ando	Dept. of Commerce and Consumer Affairs	Todd Omura	ETS
Dean Hazama	DCCA	Vince Hoang	ETS
Bryan Kodama	DCCA	Rebecca Cai	ETS
David Shak	DCCA	Juha Kauhanen	ETS

Name	Department	Name	Department
David Takashima	DCCA	Jussi Sipola	ETS
Antonio Querubin	Dept. of Defense	Bryce Fujii	ETS
Allen Kansaki	DOD	Arnold Kishi	ETS
Keith Hayashi	Dept. of Education	Brian Frey	ETS
Heigh Armstrong	DOE	Alfredo Bonilla	ETS
Todd Ogasawara	DOE	Lenora Fisher	ETS
Kali Watson	Dept. of Hawaiian Home Lands	Bill Kumagai	Transform Hawaii Government
Katie Lambert	DHHL	Emily Holtz	THG
Jerry Alambatin	DHHL	Bill Holliday	Info-Tech Research Group
Kenneth Fink	Dept. of Health	Alia Mendonsa	Info-Tech
Valerie Kato	DOH	Howard Feng	Info-Tech
Steve Sakamoto	DOH	Aundria Giusti	Info-Tech
Derek Vale	DOH	Howard Feng	Info-Tech
Ryan Yamane	Dept. of Human Services		
Mark Choi	DHS		
Rya Shimamura	DHS		
Phan Sirivattha	DHS		
Brenna Hashimoto	Dept. of Human Resources Development		
Brian Furuto	DHRD		
Kyungin Kim	DHRD		
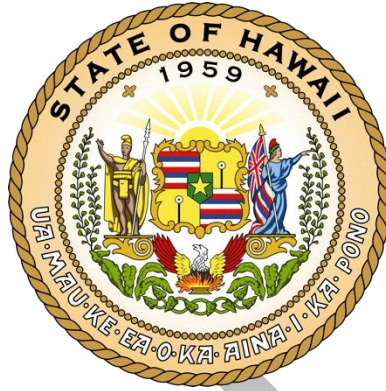
State of Hawai'i

Enterprise Technology Services

2024 Annual Report

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1. CIO'S MESSAGE

Aloha State Senators and Representatives!

I'm very excited and grateful to have been named the state's Chief Information Officer (CIO) and administrator of the Office of Enterprise Technology Services by Governor Josh Green, M.D. and, pending Senate confirmation, look forward to working with the Legislature to provide the best possible technology leadership that I can for the state.

There are many challenges to building a comprehensive and unified approach to state IT growth management including accurate budgets, increased staffing, modern infrastructure and solid cybersecurity, however I believe that we can find solutions to these and all other challenges by working together.

During my first few months as CIO, I committed to understanding the breadth of ETS services through its employees and met with them one-one one to discuss the critical roles they perform and where we can make our services even.

ETS' staff has a proven track record of excellence demonstrated by the number and variety of national awards and recognition they have received and by twice being given an A- grade in the Digital State Survey for our use of technology to "improve service delivery and constituent engagement, increase capacity, streamline operations and achieve other state priorities."

This top survey grade recognizes our achievements in IT modernization and resilience in the face of adversity including the technological support response provided after the Maui wildfires tragedy last year. The survey provides a common reference for all 50 states in the ongoing work of finding better ways to improve the public's business.

With the cooperation of the staff, we have looked closely at updating and focusing our mission and vision statements for ETS which are included in this report.

This year we are submitting an update to the Legislature of the State IT strategic plan which is intended to make sure we move technology forward together and make well-informed decisions.

With CIO now closely aligned with the Comptroller and the Department of Accounting and General Services, we are looking forward to developing a more unified approach to IT resource management throughout the state.

With the twin priorities of transparency and accountability clearly in mind, I look forward to working with the Legislature for the betterment of all the people of Hawai'i.

Please review this 2024 Annual Report and let me know what you think.

Mahalo,

CIO Christine Maii Sakuda

2. ABOUT ETS

2.1. Story, Vision, and Mission

The Office of Enterprise Technology Services (ETS) provides governance for executive branch IT projects and seeks to identify, prioritize, and advance innovative initiatives with the greatest potential to increase efficiency, reduce waste, and improve transparency and accountability in state government.

Composed of nine branches, ETS also supports the management and operation of all state agencies by providing effective, efficient, coordinated, and cost-beneficial computer and telecommunication services. The nine branches include: Production Services, System Services, Technology Support Services, Client Services, Enterprise Systems, Network, Security, Enterprise Architect, and Program Management.

ETS was established by Hawai'i Revised Statutes §27-43. ETS is headed by a full-time chief information officer (CIO) to organize, manage, and oversee statewide information technology.

The chief information officer is appointed by the governor and the statute was amended in 2024 (Act 140) to have the CIO report directly to the Comptroller. A key responsibility of the CIO is to develop, implement, and manage the state information technology strategic plan.

In June, Governor Josh Green, M.D., appointed Christine M. Sakuda as State of Hawai'i Chief Information Officer replacing Doug Murdock who retired the previous month.

Sakuda received her Bachelor of Science degree from Santa Clara University in 1991 and later received her MBA from the University of Hawai'i Mānoa College of Business Administration in 1997.

She has nearly 20 years of experience leading IT transformation initiatives in healthcare and government, on top of 15 years of experience leading nonprofit organizations.

For the past seven years, she has been the Executive Director of Transform Hawai'i Government (THG), a nonprofit organization established to catalyze the transformation of digital government services through people, process and technology to help Hawai'i thrive.

She is the State's first female CIO of Native Hawaiian ancestry.

2.2. 2024 At A Glance (Executive Summary)

In this 2024 Annual Report to the legislature, you will find updated information about the programs and services provided by ETS.

Several reports crucial to understanding our current levels of technology investment and data collection are summarized within with links to the full reports in the appendix.

By holding technology summits, ETS is a primary contributor to the collaboration of IT personal in all the executive departments along with the counties and private sector to work together to understand and build technology programs while planning for the future.

In 2024 ETS held two IT summits on data and digital government and three more are planned for 2025.

ETS supports job retention with specific IT training and job sector growth with our annual code challenge that entices young people to consider a career in technology.

This report details the many things ETS does to help provide security and safety in our every-changing cyber world while keeping a close watch on the viability of the many programs and purchases made by the state.

These contributions, assessments and investments are included in the report.

2.3.   Expenditures and Staffing

The charts below show ETS expenditures and ETS staffing by strategic pillar.

ETS EXPENDITURES BY STRATEGY
Total $47,425,370

IT Governance $2,607,846 6%

Legacy Operations $13,686,682 29%

Workforce Development $153,642 0%

CyberSecurity $3,970,861

Evergreen Operations $17,857,070 38%

Data Value $136,011 0%

Partnering $9,013,258 19%

PERSONNEL COSTS BY STRATEGY

Legacy Operations 4,338,081 36%

Workforce Development 36,333 0%

CyberSecurity 1,138,636 10%

IT Governance, 1,758,679, 15%

Evergreen Operations 1,660,014 14%

Data Value 0 0%

Partnering 2,920,375 25%

ETS POSITIONS BY STRATEGY

- IT Governance 25 positions 14%
- Evergreen Operations 26 positions 14%
- Data Value 0 positions 0%
- Legacy Operations 69 positions 38%
- Partnering 38 positions 21%
- Workforce Development 3 positions 2%
- CyberSecurity 19 positions 11%

2.4. Senate Committees

Hawaiʻi Revised Statutes §27-43 established an Information Technology Steering Committee (ITSC) to work with the CIO in developing the State's information technology standards and policies, including the strategic plan. The ITSC held six meetings in 2024.

IT Steering Committee Members

Name	Affiliation	Appointed By
Christine Sakuda (Chair)	Office of Enterprise Technology Services, State of Hawaiʻi	*Ex Officio Member*
Vacant (Vice Chair)		
Benson Choo	Finance Factors	Senate
Eugene Chang	IEEE Computer Society – Hawaiʻi Chapter	Senate
Sharon Moriwaki	Hawaiʻi State Senate	Senate
Arnold Kishi	Center for Internet Security, MS-ISAC	Governor
Joel Kumabe	Ohana Pacific Health	Senate
Michael Nishida	First Hawaiian Bank	House
Michael Otsuji	Hawaiʻi State Department of Education	Superintendent
Mai Nguyen Van	Hawaiʻi State Judiciary	Chief Justice

The CIO or designee also serves on the following state committees:

- Access Hawaiʻi Committee (ex officio Chair)
- Information Privacy and Security Council (ex officio Chair)

- Enhanced 911 Board (ex officio)
- Hawaiʻi Data Task Force (ex officio)
- Broadband Assistance Advisory Council (appointed)
- IT Consolidation Working Group

3. GOALS AND ACCOMPLISHMENTS

3.1. Introduction to Strategic Priorities

The State of Hawai'i's current IT Strategic Plan, initially adopted in 2019, sets forth seven strategic priorities:

- Partner for Successful Outcomes
- Expand Statewide Cybersecurity Strategy
- Enhance the Value of State Data
- Optimize Enterprise Systems
- Extend IT Portfolio Governance
- Implement Dynamic and Sustainable IT Operations
- Digital Workforce Development

Each of these strategic priorities is discussed in more detail below, along with updates on key initiatives that serve to advance the strategic pillars.

3.2. Partner for Successful Outcomes

This strategic priority focuses on shaping the partnership between government lines of business and IT by creating a standard framework to ensure successful outcomes. Target outcomes include successful business process implementation; IT systems that are well-engineered and appropriately designed for their intended use; effective partnerships between IT and business; procurement efficiency and cost savings; and ensuring that standard governance, business process re-engineering, program management, organizational change management and procurement systems are followed.

3.2.1. IT Consolidation

IT Consolidation under Act 179 (SLH 2022) and its amendment Act 173 (SLH 2024) represents a critical initiative to improve efficiency, security, and effectiveness of the State's IT operations. The consolidation aims to gain economies of scale, enhance service delivery, and ensure compliance with growing regulatory requirements for accessibility, information storage, data sharing, and security.

This initiative directly supports the State IT Strategic Plan's goals of optimizing IT resources, standardizing processes, and improving service delivery while reducing costs. The effort focuses on phased consolidation of selected executive branch IT services under ETS to create a more coordinated and efficient IT environment.

In 2024, progress was made across several areas including:

- Completed State IT Strategy refresh
- Drafted new Public Digital Service Vision
- Advanced state-wide service taxonomy and catalog implementation
- Made progress on selected departments' IT strategies development
- Established the State Data Task Force and adopted a state data governance framework

- Advanced IV&V vendor governance including standardized reporting, and vendor evaluation & procurement
- Further refined polices and guidance for key IT processes, such as large-scale enterprise systems procurement
- Progressed on shared services implementation (e.g. IT security services) and infrastructure consolidation (e.g. procurement of a new state cloud hosting environment)
- Conducted in-depth evaluation of integrated enterprise IT governance and management tools for ETS and for the departments to share, in anticipation of piloting and wider implementation at the state level

The IT consolidation effort continues to evolve with emerging technologies and changing needs. The recent addition of Act 173 requirements has expanded the scope to include critical systems analysis and data center resiliency. New funding will be analyzed in 2025 to support essential infrastructure modernization, enhancement of citizen-facing digital services, implementation of robust security measures, and development of our IT workforce. These investments aim to generate substantial annual savings when fully implemented, while reducing the need for increasing state IT employee headcount.

The addition of Act 173 requirements has expanded the scope to include critical systems analysis and data center resiliency. New funding requirements totaling $39.5M for FY2025 have been identified to support essential infrastructure modernization, enhancement of citizen-facing digital services, implementation of robust security measures, and development of our IT workforce. This investment is projected to generate annual savings of $12.0M when fully implemented.

BY THE NUMBERS

- Successfully consolidated IT infrastructure for 3 executive departments
- Achieved $2.1M in annual operational cost savings through consolidation efforts
- Improved system reliability from 98.2% to 99.5% uptime
- Handled over 45,000 support requests with 87% satisfaction rate
- Increased online transaction capability by 40%
- Reduced average digital service response time from 12 to 4 minutes
- Achieved 65% mobile accessibility for government services
- Reduced security incidents by 35%
- Implemented data classification standards across 80% of state agencies

3.2.2. Child Support System Modernization

The State Department of Human Services (DHS) succeeds by fostering self-sufficiency and promoting the well-being of individuals, families, and communities. A key aspect of this mission involves ensuring that constituents can readily access answers to their questions.

During and following the coronavirus pandemic, DHS faced a critical challenge: surging demand for its vital support programs had created bottlenecks in applications and communications. Long wait times and processing delays threatened their mission to support individuals, families, and communities.

To bridge this gap, DHS implemented Google Cloud Contact Center AI (CCAIP). CCAIP's intelligent call routing system efficiently directed inquiries to the appropriate agents, reducing wait times. Tiered support ensured complex issues reached the correct specialists. Integration with ServiceNow CRM offered a centralized platform for recording and managing all customer interactions, facilitating personalized service.

The impact of CCAIP was undeniable. DHS saw a dramatic increase in efficiency, with faster response times and streamlined processes. Real-time access to information and comprehensive tracking of interactions empowered agents to provide exceptional service.

Looking ahead, CCAIP's potential for even greater customer experiences lies in its advanced features: intelligent routing, virtual agents, self-service options, sentiment analysis, and real-time information provision.

By embracing AI, DHS not only transformed their support services but also strengthened their commitment to serving the community effectively.

3.2.3. Unemployment Insurance System Modernization

The Hawai'i Department of Labor & Industrial Relations (DLIR) has fully implemented its Hawai'i Career Acceleration Navigator (HI CAN), a digital hub connecting unemployment insurance (UI) claimants and jobseekers to high-impact career pathways.

Powered by the Amazon Web Services (AWS) cloud and in partnership with Geographic Solutions, HI CAN uses a combination of Machine Learning (ML), Artificial Intelligence (AI), state administrative data, and cloud computing to generate custom recommendations and job matches.

By combining technology with a human-centered approach, HI CAN provides jobseekers personalized, data-driven job and training recommendations while also connecting them with supportive services they may need while exploring a new career.

A Benefits Finder tool connects users to healthcare coverage, food support, bill paying support, and childcare services that they may be eligible for without sifting through dozens of government links that can lead to confusion and frustration.

The HI CAN platform for job seekers is the product of a partnership with national tech for social impact non-profit Research Improving People's Lives (RIPL), the National Governor's Association-Workforce Innovation Network, and the State.

Through NGA and Cognizant U.S. Foundation grant funding, HI CAN assembled a multi-disciplinary, multi-department team to create this accessible, data-driven, and full-service government platform for job seekers.

3.2.4. DHS System Modernization

During and following the coronavirus pandemic, Hawai'i's Department of Human Services (DHS) faced a critical challenge: surging demand for its vital support programs had created bottlenecks in applications and communications. Long wait times and processing delays threatened their mission to support individuals, families, and communities.

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3.2.5. Tyler Digital Government Services

The state legislature established the Access Hawai'i Committee (AHC) in 2000 to manage the state digital government portal with the assistance of ETS. ETS contracted Tyler Hawaii as the Portal Program Manager to provide guidance to the AHC relating to strategies for online payment and processing, internet initiatives, electronic document filing, paperless initiatives, and web application development.

The portal, online at eHawaii.gov, provides information and online services to state citizens. Today, the portal includes 159 online services for more than 90 state and county agencies.

Tyler also monitors the agency activities to ensure compliance with terms and conditions of their contracts, review their financial reports, evaluate new and existing Statements of Work, fee agreements, priorities, and Service Level Agreements.

ACTIVITIES AND ACCOMPLISHMENTS

The portal program launched eleven (11) new services and major upgrades in Fiscal Year 2024. These services include:

- Tax Credit Hub – Department of Business, Economic Development and Tourism
- Reservation and Access Management System - Department of Land and Natural Resources
- Tree Seedling Payments - Department of Land and Natural Resources
- PhonePay Interactive Voice Response – Tyler Hawaii
- Judicial Circuit Court Judge Evaluation – Judiciary
- Family Court Judge Evaluation – Judiciary
- Hawaii Technology Development Corporation Website Redesign – Department of Business, Economic Development and Tourism
- eBench Warrants Web Interface – City and County of Honolulu
- Tax Credit Hub Phase II - Department of Business, Economic Development and Tourism
- HIePro – State Procurement Office
- Name Change Application – Office of the Lieutenant Governor

In 2024, Tyler Hawaii worked on three (3) no-cost projects. The PhonePay Interactive Voice Response system which allows citizens to make payments over-the-phone for government services. The Judicial Circuit Court Judge Evaluation and Family Court Judge Evaluation which provides

attorneys with a convenient and easy method to complete the evaluation of ten (10) circuit court judges and nine (9) family court judges.

The State portal program earned two awards this year:

- Honolulu Emergency Services Department Website– City and County of Honolulu- Honolulu Emergency Services Department
    - W3 Award – Silver Award
    - DotComm Award – Honorable Mention

ETS is working with Tyler Hawaii to integrate our eHawaii.gov single sign on (SSO) service to make it easier for citizens and government agencies to interact in a secure, safe environment. Over half of the 80+ services have been completed in the test environment, and it is anticipated that all services will be migrated to the production environment by February 2025.

BY THE NUMBERS

The eHawaii.gov portal program provides 159 online services. In FY 2024, there were more than 1.7 million transactions on portal services averaging 4,648 a day. The portal collected $594,692,594 and disbursed $582,820,681 (98% of funds) to the State and County agencies. Tyler's portal revenue was $11,871,912 and expenses were $9,753,879, resulting in an operating income of $2,118,033.

3.3. Expand Statewide Cybersecurity Strategy

This strategic pillar focuses on expanding the statewide cybersecurity strategy to protect the State's IT infrastructure and constituent data through adoption of cybersecurity industry best practices across the State's IT systems. Target outcomes include safeguarding state and constituent information, reducing vulnerability to external threats, immediate system-wide threat response, security efficiency through use of AI/ML, and minimizing the storage of sensitive data.

3.3.1. Enterprise Notification System using Alert Media

ETS renewed the 10,000 licenses of the Alert Media services to create an Enterprise Notification System (ENS) for participating Executive Branch Agencies' staff. The ENS gives the State mass notification capabilities using voice call, text message, email, or mobile app push notification. Outgoing notifications can target by organizational entities, specific geographic locations, as well as other kinds of categorizations. It is also possible for individuals to issue a request for assistance. The ENS is functionally deployed by ten agencies now with eleven other agencies in various states of deployment. There has been continued growth of usage and cross training within the departments to ensure messages are sent and in a timely manner.

The Alert Media system is growing in popularity as the other departments hear about its services. It does take training and initial configuration and documentation to get agencies onboard.

3.3.2. Citizen Identity

The State of Hawai'i is advancing its digital transformation efforts through the modernization of its citizen identity services that allow residents to access multiple government online services using a single account. A part of this modernization initiative, currently being referred to as the Citizen Identity solution, aims to streamline interactions between citizens and the state agencies by offering a unified login experience that is both convenient and secure. By eliminating the need for multiple

accounts and passwords, the Citizen Identity solution significantly simplifies access to essential government services.

A key goal of the project is to enhance security for both users and government systems. The platform will integrate advanced features like multifactor authentication and real-time fraud detection to protect sensitive information and ensure only legitimate access. Future plans to implement identity verification processes will provide critical benefits for services requiting a high level of identity proofing, reducing the risk of fraud, identity theft, and unauthorized access to citizen and state systems and data. This initiative also fosters operational efficiency by consolidating identity management processes across agencies, reducing redundancies.

The Citizen Identity solution service represents the state's commitment to innovation and excellence in public service delivery. By creating a secure, efficient, and accessible digital identity solution, the state enhances its ability to serve its citizens while safeguarding public resources and fostering trust.

In 2023, ETS, in collaboration with the state's portal vendor, Tyler Hawaii, successfully developed a prototype integrating one eHawaii.gov application with the identity management platform managed by ETS at the time. This milestone demonstrated the potential for modernizing and unifying identity management across state services.

In 2024, ETS transitioned to a more advanced and robust identity management platform to better meet the evolving needs of the state. Development efforts were rechanneled to align with the new system, reflecting ETS's commitment to providing a secure and scalable solution. ETS continued its partnership with Tyler Hawaii to migrate more than 80 eHawaii.gov agency portals to the upgraded platform, with the full launch anticipated in early 2025.

For a table of the applications to be integrated with Citizen Identity login services, please refer to the appendix.

BY THE NUMBERS

Number of citizen accounts being migrated: Roughly 1,000,000 user accounts

Number of government portals/applications being integrated with the Citizen Identity solution: Roughly 80 apps.

CHALLENGES

In 2020, the team initially selected Azure B2C to serve as the citizen identity management platform. However, as the team worked deeper with the platform, we were faced with several challenges and limitations with Azure B2C that prompted the recommendation to transition to ForgeRock Identity Cloud. Now rebranded as PingOne Advanced Identity Cloud, the ForgeRock Identity Cloud, after careful evaluation, had been selected as the citizen identity management platform moving forward. The ETS team had to make a weighted decision and worked with the Tyler Hawaii team to mitigate the impact to the Citizen Identity solution project.

In 2025, ETS plans to complete the integration and launch of all Tyler Hawaii managed citizen portals with the ETS Citizen Identity solution for single sign-on. ETS will continue to work with the departments to expand the Citizen Identity solution and evaluate fraud protection and identity proofing services.

3.3.3. Cybersecurity Month

In October, Governor Josh Green, M.D. proclaimed Cybersecurity Awareness Month in Hawai'i, in recognition of the state's important role in identifying cyber threats, protecting our citizens from any attacks and responding quickly when threats occur.

The proclamation supports the state's continuing work on several cybersecurity initiatives such as promoting educational opportunities like CyberStart America and developing a skilled cyber workforce by working within lower- and higher-education communities.

Cybersecurity Awareness Month in Hawai'i coincides with the national observance recognized by the U.S. Department of Homeland Security, the Multi-State Information Sharing and Analysis Center, and industry partners, which collectively encourage all citizens to learn about cybersecurity to put that knowledge into practice in their homes, schools, workplaces and businesses.

ETS held a series of meeting in October for all executive branch employees to support the state's cybersecurity defense. Topics included cybersecurity basics such as safe digital habits for daily use, the importance of strong passwords, and strategies for secure password management to help guard against unauthorized access.

We also covered identifying threat actors, safeguarding yourself and your family, and finding valuable local resources for cybersecurity support. Another meeting addressed essential strategies for data protection, online and physical security, and phishing awareness.

ETS continues working to enhance the cybersecurity of critical infrastructure and improve coordination between the counties, state and federal government.

3.3.4. Elections

The Department of Homeland Security has designated elections systems as a critical infrastructure. ETS provides the cybersecurity monitoring, network management, and virtual server support to facilitate statewide elections.

ETS provides the computing, communication network infrastructure, and many layers of cybersecurity protections for the State Office of Elections digital assets.

As the processes and systems that collect and count votes are not exposed to the Internet at any time, voters can be confident that election counting results are accurate and safe.

Of 860,868 registrants in the 2024 general election, 483,078 voted by mail and 39,158 in voted in person for a total of 522,236 voters.

3.4. Optimize Enterprise Systems

This strategic pillar focuses on optimizing enterprise systems to leverage the state's investment in centralized IT services. Target outcomes include decreased IT costs and redundancy; role clarity and increased employee retention; streamlined, more effective communication; accelerated execution, including procurement and SDLC; and enterprise systems that are well-engineered and appropriately designed for their intended use.

3.4.1. Enterprise Financial System (EFS) Replacement

The state's existing financial management systems, which have been in use for decades, needs modernization to keep pace with the evolving demands of state governance and public accountability.

The state is conducting a comprehensive solicitation process to procure an offeror capable of delivering a robust, cloud-first Enterprise Financial System (EFS) that will support the state's complex financial operations, improve the efficiency of financial processes, and enable data-driven decision-making across all departments.

The successful EFS solution will:

- Standardize Financial Practices
- Leverage Modern, Cloud-First Technology
- Enhance Transparency and Accountability
- Support Strategic Objectives
- Ensure Compliance and Risk Management

The state's initiative to replace its existing FMS is strategically aligned with a broader vision of improving operational efficiency, enhancing service delivery, and ensuring robust financial governance.

The goals of this modernization effort include:

- Modernized Business Practices
- Optimized Financial Operations
- Enhanced Accuracy in Financial Reporting
- Improved Regulatory Compliance
- Increased Operational Transparency
- Advanced Analytics and Forecasting
- User-Friendly Interface
- Scalable and Flexible System
- Cost-Effectiveness and Value
- Enhanced Stakeholder Service
- Proactive Financial Risk Management
- Uniform Chart of Accounts (UCOA) Implementation
- Preparation of the Annual Comprehensive Financial Report (ACFR)

With the support of the Office of Enterprise Technology Services (ETS), the Department of Accounting and General Services (DAGS) developed a comprehensive new Request for Proposals (RFP) for the EFS.

The state hired consulting firm Gartner to assist in the development of this new RFP. Spire Hawaii LLC was also engaged to ensure the requirements gathering and development specifically related to contemporary accounting practices were documented and incorporated into the solicitation.

More than 125 meetings were held with various departments and agencies within the executive branch to ensure that the range of organizational business needs would be addressed by the new financial system.

Our updated RFP underwent vetting by more than 120 state employees with direct knowledge of our accounting and financial business requirements.

The RFP is in its final stages of quality assurance and will be submitted to the Attorney General for review. Upon approval, it will be published for vendors to submit proposals.

As part of the RFP process, over 150 subject matter experts from various departments and agencies were identified and invited to join the EFS Evaluation Committee. While 129 individuals initially expressed interest in serving on the committee, 86 ultimately committed to the time and responsibilities required of committee members.

Overall, the EFS team worked closely with 69 State departments, divisions, and attached agencies to ensure understanding of the State's diverse business operations and financial processes.

In 2024 the ETS team conducted the following:

- **EFS Update Meeting:** About 150 EFS Project team members, stakeholders, and project partners gathered at the Hawaiʻi Convention Center for the EFS Update Meeting on March 13, 2024. The half-day meeting signaled a fresh start for the EFS Project, offering attendees insight into the collaborative efforts to modernize the State's financial accounting system.
- **EFS Change Leaders Workshop:** More than 60 "EFS Change Leaders" from various State departments attended the first EFS Change Leaders Workshop, where they received specialized training in organizational change management.
- **Getting Ready for Leading Change Workshop:** About 20 Administrative Services Officers and other mid-level supervisory staff from various departments participated in workshop activities geared to help them lead their respective teams through the potential changes resulting from the EFS.

The RFP will be issued and made available for the vendor community to analyze and develop their proposals during the first quarter of 2025. Upon receipt of the proposals, they will be evaluated, and the most responsive vendors will be invited to present in person to demonstrate how their software and their teams will best meet the requirements specified within the RFP.

After the written proposals and in-person demonstrations have been evaluated, the award will be made to the responsible offeror whose proposal is determined to be the most advantageous to the State.

These efforts are anticipated to conclude by mid to late 2025.

3.4.2. Providing Technical Support for ERP Systems

[Content pending]

3.4.3. Enterprise Agreements: Microsoft G5

ETS manages the Microsoft Office 365 Enterprise Agreement Subscription (EAS) and provides its features and functions to Executive Branch departments. The ETS-managed contract for state government provides access to a suite of cloud-based productivity and collaboration tools. This includes Microsoft Office components, Outlook Email, Microsoft Teams, SharePoint, the Power Platform, and other mission critical functions.

In September 2024, the state executed year one of the Microsoft G5 licensing implementation. The G5 license level is Microsoft's most enhanced product offering, providing enterprise-level tooling for Data Compliance Management, Cyber Security, Telephony, and Data Analytics.

The state's investment in the Microsoft G5 licenses supports the State IT Strategic plan in the following areas:

- **Optimize Enterprise Systems.** G5 includes Microsoft Teams Phone, enabling a comprehensive telephony solution that can either replace or integrate with existing communication systems. Teams Phone, also referred to as Teams Calling, provides digital telephony services and basic call center capabilities. Its flexible calling capabilities support emergency communications and business continuity, remote and hybrid work, and provides potential cost savings upwards of 50% per user.

  With G5, agencies gain access to Power BI, a robust business intelligence tool that allows for the creation of real-time dashboards and deep data insights. This capability supports data-driven decision-making, which ultimately enhances the effectiveness of public services.

- **Implement Dynamic and Sustainable IT Operations.** Leveraging Microsoft 365 provides our organization with a modern, flexible platform that ensures our business systems are always up to date, secure, and capable of meeting both current and future needs. With regular automatic updates, we benefit from the latest productivity tools, enhanced security features, and improved functionalities with little disruption to our services. This approach enables our systems to remain aligned with the evolving technology standards and allows staff to focus on core business objectives rather than maintenance tasks.

  The suite's cloud-based architecture supports seamless collaboration and access across devices, allowing business users and remote employees to connect, share, and collaborate in real-time – enhancing productivity and responsiveness. Features like Microsoft Teams, SharePoint, and OneDrive for Business facilitate team collaboration and information sharing, fostering a more connected and agile workforce

  The much-anticipated release of Microsoft 365 Copilot set for late 2024 will generate a surge of use of the various Copilot products. Microsoft G5 gives the state enhanced capabilities to govern and manage Artificial Intelligence (AI) services and to protect and secure the state's data.

  Microsoft 365 helps us deliver better digital services by maintaining secure, reliable, and user-friendly systems. Robust compliance capabilities ensure we meet regulatory requirements for handling sensitive information, and scalable resources enable us to expand services as citizen needs grow. By integrating Microsoft 365 into our operations, we create a foundation that supports innovation and flexibility, preparing us to adapt to the needs of both our employees and our community now and in the future.

- **Expand Statewide Cybersecurity Strategy.** With Microsoft 365 G5, we can now better protect citizen data and critical government information, ensuring compliance with local, state, and federal regulations. These enhanced tools allow us to mitigate risks, maintain a strong cybersecurity posture, and uphold the public's trust in our ability to secure their data.

  - Transitioned more than 13,700 state users from the Microsoft O365 G3 licensing level to the M365 G5 licensing level.
  - Assisted multiple agencies on their transition from traditional phone systems to the cloud-based telephony solution using Microsoft Teams Calling.
  - Made available an enterprise solution for mobile device management of company cell phones, which will help enforce company policies and protect sensitive data.
  - Assisted additional departments with the migration of their traditional network file servers to cloud-based storage solutions.

- o Released statewide guidance and tooling for implementing a passwordless login solution for endpoints, leveraging Windows Hello for Business.
- o Hosted the following Microsoft training workshops - Microsoft Azure Security Best Practices, M365 Copilot and Azure Copilot, and Microsoft AI Governance Fundamentals.

Challenges: The state's Microsoft Enterprise Agreement Subscription (EAS) contract was due for renewal on July 1, 2024. However, due to the lobbying efforts of Microsoft with the State Legislature to secure a budget for the upgrade to G5, ETS received funding in fiscal year 2025 to execute the transition. This impacted the timely renewal of the EAS and ETS entered a 90-day grace period on July 1 to update the contract with the enhanced G5 functionality. Furthermore, due to budget constraints, the Governor reduced the G5 budget line item by half. In order to avoid mass disruption or possible loss of access to the Microsoft services, ETS leveraged funding across other ETS programs to cover the cost of the Microsoft license renewal in fiscal year 2025 quarter one as the state entered into the 90-day grace period to complete negotiations and executed the revised annual renewal before September 30, 2024.

3.4.4. Enterprise Agreements: Adobe

ETS provides management and administration of a statewide electronic signature (eSign) software using the Adobe Acrobat Sign platform. The eSign service is available to the vast majority of state employees across the executive, legislative, and judicial branches of government. ETS manages the Adobe Enterprise Term License Agreement (ETLA), which includes the eSign platform as well as software licensing for Adobe Acrobat, the Adobe Document Cloud, and all Creative Cloud software.

Adobe Sign enables increased government efficiency and enhances productivity for employees and constituents by transforming traditional paper-based workflows into fast and efficient digital processes. Teams can quickly send, sign, and manage documents electronically, eliminating the time-consuming steps of printing, scanning, and physically handling paperwork.

The state's investment in the Adobe electronic signature platform supports the State IT Strategic plan in the following areas:

- **Optimize Enterprise Systems.** ETS continues to invest efforts in assisting departments with the further digitalization of processes requiring signatures.

- **Implement Dynamic and Sustainable IT Operations.** Keeping government functions operational in hybrid work environments or during a disaster or emergency is a key objective of the State of Hawaiʻi preparedness plan. Technology services that enable employees to work remotely and through the web is critically important during these situations. Cloud computing and hosted applications or Software as a Service (SaaS) allow workers to remotely access the software and data they need from outside of the office.

Adobe Sign allows workers to facilitate the signing of documents securely and legally through the web. Workers can continue to process documents that require signatures without the need to print, manually route, or wet sign, keeping essential business processes timely and flowing. Workers have access to the Adobe Sign service from any web browser with an internet connection whether they are working in or away from the office.

- Performed an upgrade and migration of the Legislature and Department of Education Adobe Sign accounts from a legacy Adobe Sign platform to an updated version.

- Implemented a reimbursement system for ETS to recoup costs from departments utilizing the various Adobe software licenses available through the ETS Adobe ETLA.
- Continued to enhance the functionality of the eSign platform, enabling additional features and providing training to users and IT staff across the departments.

Challenges: Due to the restructure and price increase enforced by Adobe on the renewal of the state's multi-year Adobe ETLA in 2022, ETS could no longer afford to cover all costs centrally. Out of necessity, ETS implemented cost reimbursements with each department and departments were required to cover the cost for their individual Acrobat and Creative Cloud licenses. With the budget ETS had to work with, ETS could continue covering the cost of the Adobe Sign platform and a portion of the department Acrobat usage as a centrally cost-covered shared service.

3.5. Implement Dynamic & Sustainable IT Operations

This strategic pillar, also referred to as "Evergreen Operations," focuses on implementing dynamic and sustainable IT operations to ensure business systems are up-to-date and ready to support the current and future needs of business users and citizens at all times. Target outcomes include IT systems that can be quickly configured to meet business needs; systems that are healthy, stable and upgradeable; systems that are well-engineered and appropriately designed for their intended use; decommissioning legacy systems; and ensuring that the state is positioned to quickly benefit from new technology.

3.5.1. Kalanimoku Data Center Migration Efforts

ETS has been working with executive branch departments over the past several years to incrementally transition computer systems and services from the State Data Center in the basement of the Kalanimoku Building to commercial data centers to achieve a higher level of security, electricity cost savings, and more reliable and flexible services.

In 2022, legacy mainframe computer applications transferred from physical equipment to a cloud-based "Mainframe as a Service" provider using state-of-the-art data centers in Omaha, Nebraska. With that change, the state no longer owns mainframe computer hardware.

Concerns in the aging data center include power failures, cooling equipment, and flooding in the basement location. The few remaining computer systems, communication networks, and high-volume printing services will similarly migrate out of the Kalanimoku data center with complete decommissioning expected by 2026.

An assessment of the major services found three critical systems remain: The IBM AIX servers, the NCIC room housing servers and circuits for CJIS, and the mass printing services we provide to the state in printing checks and reports.

Two departments, DCCA and ATG, continue to use the IBM AIX Power system and we are working on retiring the leased equipment in the near future. The NCIC room continues to house critical connections to law enforcement agencies. The Attorney General IT department expects to complete upgrading of the server by the end of 2025, and the network connection to the FBI near the end of 2027.

For the printers, ETS is working closely with HGEA to migrate the print services to a non-flood location. A table is included in the appendix that shows the year-over-year reduction in cases of paper used for legacy print services.

3.5.2. POC to Build Out AWS Landing Zone (Public Cloud)

The Government Private Cloud (GPC) provides virtual servers for hosting departmental applications in a secure, government-owned and maintained private cloud environment, supporting both Windows and Linux environments.

Currently, the GPC is hosted across three strategic sites across on Oahu: the Kalanimoku Building, the University of Hawai'i, and DRFortress.

As part of our strategic vision, ETS continues to expand the GPC by transitioning from state-maintained physical hardware to a public cloud infrastructure. This initiative addresses the end-of-support for the existing hardware and eliminates the need for costly hardware refreshes. Instead, ETS is committed to leveraging cloud-based infrastructure-as-a-service (IaaS) subscriptions, ensuring a modern, flexible, and efficient platform to meet the state's evolving needs.

To sustain this critical migration, ongoing funding will be required to transition servers and workloads seamlessly from physical hardware to the cloud-based datacenter. The future GPC will no longer rely on physical infrastructure, instead integrating on-island capabilities with public cloud resources to achieve a scalable and resilient hybrid cloud environment.

This transition will enable ETS to further develop its hybrid cloud capabilities, delivering the following key benefits:

- Enhanced Disaster Recovery: Establishing off-island disaster recovery (DR) capabilities for core and critical virtual servers ensures operational continuity during emergencies, safeguarding vital systems hosted on-island.

- Reduced Physical Footprint: By migrating production and test virtual servers to a mainland-linked public cloud, ETS can significantly reduce the reliance on on-island physical servers while leveraging managed server solutions.

- Rapid Scalability: The public cloud environment allows for quick scaling to accommodate additional workloads or shifting workloads as organizational needs evolve.

- Seamless Workload Mobility: With the flexibility to move virtual servers effortlessly across cloud and on-premises environments, ETS can respond efficiently to DR events and optimize performance or cost metrics.

- Enhanced Compliance and Certification: The hybrid model facilitates onboarding of mission-critical and regulated application workloads. It supports data center certifications such as FedRAMP authorization, IRS 1075, CJIS, and CMS, expanding the GPC's capabilities for sensitive applications.

Additionally, the transition creates opportunities to upskill state IT staff, enabling them to focus on higher-value activities like automation, compliance, disaster recovery, and service-level agreement (SLA) management for critical workloads, while reducing the burden of administrating facilities, hardware, and operating systems. These advancements ensure that the GPC remains a cutting-edge, scalable, and efficient solution for Hawai'i's IT infrastructure.

This expanded vision for the GPC represents a transformative shift, ensuring that Hawai'i remains at the forefront of innovation, resilience, and operational efficiency in its IT infrastructure. By embracing this modernized hybrid approach, ETS positions itself to meet current demands while laying the groundwork for future technological advancements.

In 2024, ETS worked with a cloud partner to perform an assessment of the current GPC infrastructure and server environment. The goal was to optimize resource allocation, identify suitable cloud

products and services, and develop a data-driven business case for cloud migration. This involved a detailed analysis of the existing infrastructure, right-sizing recommendations, cost savings identification, and licensing guidance, culminated into a final report and presentation of findings to the ETS cloud team.

ETS piloted a proof-of-concept with a cloud partner for the design, implementation, and migration of a few selected applications and workloads to a public cloud environment. The objective of the project was to determine whether the proposed public cloud environment would be able to sufficiently support the requirements of the state applications that are hosted in the current GPC infrastructure.

The project also looked to ensure that the target public cloud environment was scalable, secure, and compliant with necessary regulations. The project started with discovery and high-level planning, followed by migration design and facility build, detailed planning and event preparation, migration execution and testing, and concluded with support and handover to the ETS cloud team.

Additional phases of the proof-of-concept were identified as a result of this project and further testing is still to be done to fully ensure that the environment will be production ready to host mission critical IT infrastructure and business critical department applications.

BY THE NUMBERS

The GPC assessment analyzed 525 total server instances in the current on-premises cloud environment.

The transition to re-architect the Government Private Cloud (GPC) introduced significant changes across multiple dimensions, including the underlying platform and technology, the structure of shared service offerings for departments, budgetary considerations, and the skillsets required to support the evolving solution. This ambitious initiative demanded extensive planning and adaptability from staff, who were stretched thin as they balanced the demands of this transformative project with the ongoing maintenance and support of the existing cloud infrastructure.

To tackle these challenges, ETS collaborated with a cloud integrator to provide strategic and technical guidance throughout the transition. The ETS cloud team committed to quickly learn the new technologies, actively participating in numerous cloud training opportunities to expand their expertise and support the initiative effectively. Significant work remains as this project continues to evolve and take form.

In 2025, ETS will continue its collaboration with a cloud partner to further refine and strengthen the new GPC cloud environment. Additional integration phases will focus on advancing the design and development of the infrastructure, ensuring the solution delivers robust resiliency, optimal performance, enhanced security, and comprehensive governance. The migration of critical workloads will undergo rigorous user acceptance and environmental testing to ensure the new environment meets performance and reliability standards before full implementation.

3.5.3. Production Services

[Content pending]

3.5.4. Hawaiʻi Wireless Interoperability Network (HiWIN)

ETS manages the Hawaiʻi Wireless Interoperability Network (HIWIN) supports more than 6,000 radios and operates across 44 Land Mobile Radio (LMR) sites, with an additional eight sites dedicated to microwave backhaul, totaling 52 locations statewide. HIWIN is a critical communication

network utilized by state agencies, federal partners, county responders, EMS, and all major airports. It ensures seamless coordination and interoperability for police, fire, EMS, lifeguards, and other first responders throughout Hawaiʻi.

HIWIN's primary focus is to enable seamless, reliable, and secure communications across various government and emergency response agencies, fostering rapid coordination in both daily operations and times of crisis. With Hawaiʻi's geographical isolation and unique vulnerability to natural disasters—such as hurricanes, tsunamis, and volcanic activity—effective and robust communication systems are indispensable.

For ETS, HIWIN aligns with the commitment to modernize Hawaiʻi's IT infrastructure and ensure continuity in government operations through technology-enabled solutions.

Primary Goals, Objectives, and Key Outcomes:

- Ensure Communication Resilience: Establish resilient, secure, and interoperable communication systems that support mission-critical functions across state, county and federal public safety agencies.
- Enhance Interagency Coordination: Provide a shared platform for efficient communication between agencies such as law enforcement, fire, EMS, and other first responders, optimizing response times and enhancing public safety outcomes.
- Support Technological Advancement: Integrate emerging technologies to increase coverage, reliability, and ease of access for users, ensuring HIWIN remains adaptable to future needs.
- Alignment with the State IT Strategic Plan: HIWIN aligns closely with the State IT Strategic Plan by advancing the goals of infrastructure modernization, interoperability, and resilience. By facilitating a secure, unified communication network, HIWIN supports statewide initiatives that drive digital transformation in public safety and government operations, ensuring that Hawaiʻi's IT systems are both sustainable and prepared to meet the demands of modern public service.

In 2024, HIWIN achieved major upgrades to increase capacity and resilience, including transitioning 10 sites from legacy Frequency-divisions multiple access (FDMA) to Time Division Multiple Access (TDMA) to better serve Hawaiʻi's public safety needs.

In 2024, significant advancements were made in upgrading and modernizing HIWIN to ensure its readiness for modern communication demands and its resilience in critical situations.

Multiple layers of redundancy were added to HIWIN to fortify the network's reliability. This included implementing both cellular and Starlink connectivity options across several sites, providing failover capabilities that ensure continuity even if primary communication pathways are disrupted.

Several HIWIN sites received upgraded IP data routers to enhance connectivity and integration with state IT systems.

For 2025, HIWIN aims to expand TDMA coverage, enhance network resilience through added redund.

3.5.5. Next Generation Network

Next Generation Network (NGN) began in the early 2000's to support the use of multimedia agency applications, like video, by state agencies. Today, NGN is a fully connected and integrated statewide network.

NGN provides communications capacity to state agencies enabling them to deliver services to the public and on-demand communication between state agencies.

The key factor that enabled NGN to be implemented statewide is the Institutional Network (INET) provision Division of the Department of Commerce and Consumer Affairs. Through the INET provision the State has been able to procure fiber optic connections from cable TV companies, at their cost, to create the desired bandwidth with state-provided communication (network) equipment at the ends of the fiber optic cabling and manage the bandwidth through state network management systems.

NGN is a necessary asset for ongoing State operations and can be thought of as the State's "cloud."

ETS has the responsibility of ensuring that the communication (network) equipment is updated and compliant with the manufacturers' requirements. Much of the NGN's communication (network) equipment is reaching "end of life (EOL)" status. Once the equipment reached EOL status, the manufacturer drops support of it.

Accordingly, much of ETS's activities related to NGN in 2024 has centered around the replacement of equipment that have reached EOL or soon will. Some replacements are done for upgrades to newer models with more capability.

Each replacement effort is a project in itself that requires considerable work and staff resources. Preparation of the replacement equipment includes configuration programming and testing. Equipment replacement often requires downtime for a portion of the network so scheduling with the staff where the equipment is located, and all other State agency offices that will be impacted by the downtime is critical. Often, replacement work is scheduled after hours, or on the weekend to minimize the impact.

3.5.6. Emergency Operations

ETS has continues to provide 24/7 IT & telecommunication staffing support for the State Emergency Operations Center at Diamond Head where they monitor operational status of statewide communications networks, assist with expanding state worker telework and teleconferencing capabilities, and provisioning Internet broadband and IT services.

3.5.7. Shared Services Help Desk

The ETS Service Desk serves as the central hub for IT support of ETS shared services across all executive branch departments. The Service Desk plays a critical role in streamlining IT administration across the state and provides comprehensive technical assistance to state agencies and users, ensuring efficient resolution of IT issues, continuity of operations, and improved governmental access to information systems.

The Service Desk provides support, service request fulfillment, and escalation for ETS shared services in the categories of Accounts & Access, Business Applications, Cyber Security Services, Data Management, Desktop & Mobile Devices, Document & File Management, Enterprise Applications, Network & Connectivity, Productivity & Collaboration, Service Hosting & Storage, and Website Services.

Its primary goals include improving customer satisfaction, reducing ticket resolution times, and expanding communication and awareness of available services.

The Service Desk is a critical component of IT service management, playing a key role in tracking incidents, managing problems, and ensuring the smooth operation of shared IT services.

In December 2023, ETS upgraded from a homegrown service desk system to a cloud-based, commercially available IT Service Management platform. The previous system faced performance limitations that impacted the productivity and efficiency of the ETS Service Desk staff, and it lacked the scalability required to meet the increasing demands of the Service Desk's service management processes. The new system has significant enhancements in usability, design, and performance, providing the necessary improvements to better support the Service Desk's operations.

By the end of 2024, ETS will have completed its first full year using the new IT Service Management platform. Since the migration, ETS has handled approximately 6,000 service tickets, demonstrating the system's capacity to efficiently manage the increasing volume of requests. The transition has provided notable benefits, including faster ticket resolution times, improved user satisfaction, and greater scalability to meet future needs.

Optimizing IT Support for Government: Increased Service Desk Positions

As the state assessed its IT consolidation plan under Act 179, ETS recognized the need to increase staffing within its Service Desk to support and manage the expanding areas of service management and end-user IT support

The ETS Service Desk plays a vital role in supporting all executive branch customers, primarily assisting IT Coordinators across departments, and delivering shared services to approximately 12,000 state employees statewide. However, the Service Desk has been staffed by only two full-time employees and is supervised by a section manager who also oversees the Public Information Access Section, which is primarily responsible for managing the state's public websites and other web services. This structure highlighted the need for a dedicated manager to focus specifically on IT Service Management and customer support. The addition of this role will improve operational efficiency, enhance service delivery, and ensure more effective management of the growing demands for IT support.

During the 2024 Legislative Session, ETS successfully secured approval for two additional Service Desk positions, which will greatly enhance its ability to support state operations and improve IT service delivery. A new Service Desk Manager role was created to oversee staff and operations, with a focus on strengthening IT Service Management capabilities and advancing ETS's role as a provider of shared IT services. Additionally, a new Help Desk Specialist position was established to address the growing volume of service tickets and provide specialized expertise in managing endpoint and mobile device services across the state. These strategic additions will improve service efficiency, reduce ticket resolution times, and support the continued expansion of shared IT services. ETS anticipates filling these positions in 2025, which will further enhance the department's ability to meet the increasing demands of state employees and agencies.

Optimizing IT Support for Government: Improved Service Desk Processes

In 2024, the ETS Service Desk implemented several key advancements to improve the delivery of IT support. Automated workflows were developed within the new IT ticketing system, allowing tickets to be routed efficiently to the appropriate teams across the organization. Additionally, ETS began building a technical service catalog to enhance customer interactions with shared services, increase awareness of ETS-provided services, and make access to these resources more intuitive and searchable. The Service Desk is also standardizing customer and internal documentation, creating a centralized knowledge base within the new IT Service Management (ITSM) platform to support consistency and efficiency.

The ETS Service Desk continues to expand its adoption of IT Service Management (ITSM) and IT Operations Management (ITOM) practices to deliver reliable, efficient, and proactive IT support. These efforts include streamlining incident management, service requests, and change control processes through ITSM, as well as developing automated monitoring and alerts to track the performance and availability of shared services. Together, these initiatives are enhancing service quality, improving system reliability, and strengthening the overall IT support framework for the State of Hawai'i.

In 2025, ETS will focus on enhancing the Service Desk ticketing platform by expanding the Service Catalog to include additional services and streamline the service request process. Efforts will also prioritize refining service level descriptions to clearly define offerings, exclusions, and shared responsibilities. Additional knowledge and solution articles will be developed and published to improve documentation, making information more accessible and searchable for customers. ETS will continue to automate and integrate other IT systems with the Service Desk platform, optimizing alerting and triaging processes for IT infrastructure issues. Lastly, ETS will develop a comprehensive onboarding and offboarding process and workflow for employees, seamlessly managed through the Service Desk platform.

3.6. Extend IT Portfolio Governance

This strategic pillar focuses on extending the state's IT governance model to better align the state's functions with resources and ensure the state follows industry best practices and garners the full benefits of its investments. Target outcomes include proactive and transparent portfolio planning and management though system life cycle; transparency into cost, schedule and performance and re-baselining of projects; sharing and reuse of existing hardware and software; and IT systems that are well-engineered and appropriately designed for their intended use.

3.6.1. LeanIX

LeanIX serves as the State Executive Branch overall IT Portfolio management tool. LeanIX enables a proactive, strategic approach to IT portfolio management, helping state government increase efficiency, reduce costs, and enhance service delivery across the board.

All significant information systems are inventoried in the LeanIX Application Portfolio, enabling enhanced visibility and transparency into the technical soundness of the state's systems – and identification of the most urgent systems for replacement, modernization, and migration.

Every department must enter all IT Spend Requests over $100,000 in the LeanIX IT Demand Portfolio, thus enabling rationalization and centralization of IT demand and project prioritization, alignment of IT spending to strategic goals, more transparency across agencies, and an enhanced level of IT project risk management.

In 2024, ETS Information Technology Governance (ITG) continued the ongoing data collection into LeanIX on the state's Executive Branch overall IT portfolio by establishing standard data collection views for both departmental Application portfolios and departmental Project/Spend Request portfolios.

ETS ITG extended the data model of LeanIX to accommodate service design and planning. Starting with ETS services, service fact sheets can be connected to service customers service providers, information systems supporting the service, and IT spending related to the service.

ETS ITG developed a custom extension to LeanIX for expressing departmental IT Strategic Plans that can be related to rest of the LeanIX managed executive branch IT portfolio data – Business Goals, Business Capabilities, IT Goals, Applications, and Projects (IT Spend Requests).

ETS ITG developed a custom extension to LeanIX for streamlined IT Spend Requests.

The appendix includes a table that shows year-over-year IT portfolio governance metrics.

3.6.2. Independent Verification and Validation Reports (IV&V)

Pursuant to section 27.43.6, HRS, and section 93-16, HRS, Independent Verification and Validation (IV&V) Reports for certain major systems are submitted to the legislature and posted on the ETS website.

IV&V provides a rigorous independent process that evaluates the correctness and quality of the business product of the project to ensure that the product is being developed accordance with customer requirements and is well-engineered.

The reports are submitted monthly.

In 2024, ETS provided IV&V oversight over the following projects:

- Department of the Attorney General Child Support Enforcement Agency's KEIKI Replatform Off Mainframe Project
- Department of Health's Behavioral Health Administration Integrated Case Management System
- Department of Human Services' Systems Modernization Project
- Department of Human Services Med-Quest Health Analytics Program
- Department of Labor and Industrial Relations, Unemployment Insurance Division's Modernization Project
- Department of Transportation's Financial Management Systems Project
- Department of Commerce and Consumer Affairs Business Registration Modernization Project

3.7. Enhance Value of State Data

This strategic pillar focuses on maximizing the value of state data by designing, implementing and governing state systems for data stewardship, sharing, and public use. Target outcomes include making state data more valuable for economic and public purposes; improving transparency and accessibility by ensuring that appropriate state-stored/managed data is available to the public and to other state departments, agencies, and users; and increasing awareness so that all stakeholders know what data is accessible and why certain data should not be accessible.

3.7.1. Data & AI Mission, Vision, and Strategy

In October 2023, the Green Administration and ETS named Rebecca Cai as the state's first Chief Data Officer (CDO). One of Cai's first priorities as CDO was to work with the State Data Task Force to create and publish a vision, mission, and strategy for data and AI. The vision, mission, and strategy are intended to drive trust, transparency, citizen satisfaction, and innovation by improving security,

quality, accessibility, and accountability with regard to data and AI. The strategy is published online at https://data.hawaii.gov/#dataStrategy and will be reviewed annually going forward.

3.7.2. Data & AI Policies Standards

Beyond the foundational vision, mission, and strategy for data and AI, statewide policies and standards are necessary to consistently manage and use data and AI technologies. In September 2024, Hawaiʻi published its first standards document, addressing the topic of data quality. Five additional standards documents have been drafted and are expected to be published in December 2024, addressing the topics of data classification, data privacy, data cataloging, data retention, and open data. To develop these standards for Hawaiʻi, research was done to understand policies at the federal level and in other states, and the State Data Task Force was involved in reviewing and approving the Hawaiʻi standards. Additional policies and standards are planned for development in 2025.

3.7.3. Data Governance Framework

One of the first steps toward breaking down data silos within the state and promoting data sharing is to establish a shared understanding of who owns what data and what access controls need to be in place to ensure data protection and compliance. These goals are accomplished through a data governance framework, an effort which includes identifying what data each department has, who is the business owner of each data set, what access controls are required, and what the quality of the data is. In 2024, a statewide data governance framework was created with approval from the State Data Task Force, and a data governance working group was established with a designated data lead from each department. In 2025, the working group is expected to identify data owners and establish access control for sharing by use case. Current information related to this effort is available at https://data.hawaii.gov/#governance

3.7.4. Data & AI Statewide Platform

Another step toward breaking down data silos within the state and across departments is to implement a data sharing platform. In 2024, ETS began to collaborate with departments on this concept. This shared data platform would not replace any departmental data systems; instead, it would provide capabilities to secure and govern data, enable data owners to appropriately manage data access, ensure that all data follow the same standards and can easily be merged, and provide AI/ML capabilities for simulations and decision support. One department has participated in this effort already, and additional departments are expected to participate in 2025.

3.7.5. Data Literacy Training and Certification

Because data is embedded in the daily activities of all state workers, it is critical that all staff understand how to handle data properly. This includes topics like data privacy, data quality, and how to evaluate whether data is trustworthy. To support staff education, a data literacy framework was developed in 2024, encompassing 9 different topics. These were developed into nine published lessons, an effort which included researching contents for each topic, obtaining approval for the contents to use, developing assessment questions, developing the website to host the materials, and creating digital certificates. Three levels of certification are currently available: bronze, silver, and gold. Plans for 2025 include promoting the lessons among state employees, improving the training contents, and tracking progress and participation. Materials related to this effort are available online at https://data.hawaii.gov/data-literacy.

3.7.6. Data & AI to Enable Governor's Priorities

Following the 2023 wildfires on Maui, conversations began to take place regarding how data can be leveraged to better support disaster preparedness. Data availability, timeliness, and quality are all critical to disaster preparedness, and challenges related to how to securely share data and maintain compliance need to be addressed as well. In 2024, ETS supported data sharing discussions with the Office of Recovery and Resilience, the Office of Wellness and Resilience, and HI-EMA regarding what data to bring together for disaster readiness. A proof of concept to support disaster readiness through data and AI will begin in 2025.

3.7.7. Data & AI Summit

In April of 2024, Hawaiʻi hosted the first ever State Data & AI Summit of all 50 states. This summit brought together data-focused public sector professionals with leading industry partners to connect on innovative approaches to managing, governing, and using data empowered by AI to make tough decisions. Summit attendees had the opportunity to learn about leading trends, share success stories and lessons learned, participate in cross-departmental discussions, and help position the state better utilize data and AI to make decisions and serve constituents. Attendance exceeded the originally expected capacity by 75%, ultimately reaching over 175 participants, with many more being turned down due to space limitations. Building on this success, a second Data & AI Summit will be held in 2025. Additional information about the inaugural State Data & AI Summit can be found at https://events.govtech.com/Hawaii-Data-Summit.

3.7.8. Hawaii.gov Mobile Application

The CIO, with the help of ITSC, will discuss ideas to enhance and promote the usage of the Hawaii.gov mobile application as required by Act 82, SB 2287.

Our current mobile app, developed by Tyler Technologies, is only available on the Apple store and has not been updated since November 2017.

All state websites are configured to be readable on all platforms include cell phones.

A working committee will need to be established to recommend improvements.

The first step would be to determine what is needed to improve the app. Then an estimate of costs and workforce needs would be created and related funding requests would be needed to upgrade the app.

3.8. Digital Workforce Development

This strategic pillar focuses on establishing a continuous learning culture and growth mindset to modernize how we work and enable the state to develop and sustain the digital workforce needed in a constantly evolving IT world. Target outcomes include consistently attracting high quality candidates for all IT job openings; developing a culture and work environment that promotes/encourages remote work and flexibility; and a re-branding of the government IT workforce as an Innovation Center with a culture that embraces digital tools and technology.

3.8.1. Digital Government Summit

The 2024 Hawai'i Digital Government Summit, organized by Government Technology Magazine, was held on December 4 and is a collaborative forum to share information technology best practices, to hear about emerging technology trends, and to reflect on our future challenges.

Attendees connected with peers from the government and industry sectors to share ideas, best practices, and technology trends.

Governor Josh Green, M.D. welcomed the attendees followed by CIO Christine Sakuda, keynote speaker Anton Gunn on Leading with Vision, and Teri Takai, the senior vice president of the Center for Digital Government.

Working sessions topics included Balancing Innovation and Trust Through AI Governance; Essential Cybersecurity Resources; The IT Workforce Evolution; Driving Transformation: Modernizing Hawai'i's Enterprise Systems; Powered by Purpose: Hawai'i's Digital Front Door; Those Who Collaborate Win; Roadmap to the Cloud: and The Evolving Role of Technology: Driving Civic Innovation.

This professional development and learning event drew more than 300 participants from all levels of government in Hawai'i.

3.8.2. Hawai'i Annual Code Challenge (HACC)

Nine technology-focused teams comprised of high school students, college students, and young professionals took home $18,000 in awards during the ninth Hawai'i Annual Code Challenge (HACC) on Nov. 16 at the University of Hawai'i West O'ahu.

The HACC is an annual educational event that solicits challenges from state departments and community groups and asks student, amateur and professional coders to develop technology applications to help solve specific problems. This year's challenges ranged from improving the state's open data portal, to better energy efficiency, to creating a game to help identify bird species in Hawai'i.

About 120 people including friends, family and supporters watched as 17 finalist teams presented their solutions to six different challenges before a panel of judges. Prizes were $3,000 for first place, $2,000 for second place, and $1,000 for third place in three categories (high/middle school, college and professional). A table showing the first, second, and third place winners for each category is included in the appendix.

The HACC was created to encourage engagement between Hawai'i residents and the local technology community to modernize state functions and services for a more effective, efficient, and open government. Another objective of the hackathon is to strengthen the pipeline of the IT workforce and expand the tech industry in our state.

By the Numbers:

- 158 participants
- 47 high school students
- 41 teams created
- 27 projects submitted
- 17 team finalists

Challenges:

- University of Hawai'i – Digital Navigator
- Tyler Hawai'i – Hawai'i AI Concierge Bot
- Enterprise Technology Services – Citizen Portal on Open Data
- Hawai'i Broadband Digital Equity Office – Digital Equity Dashboard
- Hui Manu O Ku – Aloha Birds Game
- Hawai'i Keiki Museum – Energy Usage Display

The HACC would not be possible without the financial and in-kind support of local and national technology businesses and educational and non-profit partners.

Sponsors: Microsoft, Verizon, Google for Government, Transform Hawai'i Government, Hawaiian Airlines, Salesforce, Tyler Technologies, eWorld Enterprise Solutions, Hawai'i Data Collaborative, AT&T, AWS, Hawaiian Electric, and DRFortress.

Partners: IMAG Foundation, the Hawai'i Department of Education Computer Science Team, UH Mānoa Information & Computer Sciences, Hawai'i Pacific University, Pi'ikū Co., and the Chamber of Commerce Hawai'i.

3.8.3. Training

A team at ETS was tasked by the CIO to find a low-cost effective solution for continuous learning and upskilling training of technology staff. The team researched several online and live training technology companies and reached out to DHRD to discuss training providers.

DHRD recommend a training provider that was already integrated with their systems. The ETS team negotiated cost and flexibility with the provider TOTI Training at $750 per person per year.

ETS sought a training platform to cover multiple technology knowledge areas to:

- Promote continuous learning for ETS employees
- Keep ETS employees current with ever changing technology
- Upskill/reskill ETS employees to promote employment mobility and provide professional growth

A total of 100 annual licenses were procured. Training features both live/interactive training and web-based training for 24-7 access with 111 learning topics including Artificial Intelligence, Cybersecurity, Cloud Solutions, Data Science, Server Administration, Database Operations, and Project Management.

3.8.4. Recruiting

It is a priority for ETS to recruit and retain employees to ensure continuity of operations and to be able to provide support and services for Executive Branch departments to operate effectively and efficiently.

ETS staff have participated in the quarterly job fairs at the Neal Blaisdell Center and the University of Hawai'i. In addition, ETS staff held on site job interviews at the Hawaii Technology Development Corporation Holiday Tech Job Fair in December.

ETS also organized the 9th Hawai'i Annual Code Challenge (HACC) to promote interest with high school and college students in working for the state in IT.

To retain employees and upgrade skills, $75,000 was spent on licenses to a wide range of fields to develop IT staff's knowledge and abilities.

A challenge to hiring in 2024 was that ETS had vacancies in its two HR positions, the HR Manager and the HR Assistant. The positions have been filled, but both staff are new to government and needed training in procedures and policies.

ETS is continually assessing the organizational structure and types of job requirements and classifications to align with the state IT strategic plan and looking at work schedules and telework to entice new applicants.

4. AWARDS AND RECOGNITION

In 2024, ETS and other executive departments were recognized both locally and nationally for their IT projects to improve state services.

4.1.   In-House Awards

The Office of Enterprise Technology Services launched the inaugural State of Hawai'i Technology-Enhanced Business Capability Awards Program in 2024 to recognize efforts in the executive branch departments to modernize state services through the utilization of technology.

Winning project from six state departments were recognized during the Hawai'i Digital Government Summit on December 4.

Three of these projects were also NASCIO Awards Program finals with one project winning the National Award.

The winning projects are:

- The Hawai'i State Energy Office for its Geospatial Decision Support System in the Emerging and Innovative Technologies category. This project was also selected as the National Award Recipient for the NASCIO 2024 State IT Recognition Awards.

- The Department of Human Services for its AI-Powered Statewide Branch Services Desk in the Business Process Innovations category. They were also selected as an Award Finalist for the NASCIO 2024 State IT Recognition Awards.

- The Department of Labor and Industrial Relations for its Hawai'i's Career Acceleration Navigation in the Cross-Boundary Collaboration and Partnerships category. Selected as an Award Finalist of the NASCIO 2024 State IT Recognition Awards.

- The Hawai'i State Energy Office for its Energy Data Portal in the Data Management, Analytics, and Visualization category.

- The Hawai'i Housing Finance and Development Corporation for its Hawai'i Fire Relief Housing Program in the Digital Services: Government to Citizen category.

- The Office of Enterprise Technology Services for its Emergency Communications Response in the Information Communications Technology Innovations category.

4.2.   DAGS Service and Incentive Awards

ETS staffers were recognized during the Department of Accounting and General Services 2023 Incentive and Services Awards Ceremony at Washington Place July 29 for their efforts to improve state government.

4.2.1. Team of the Year Award: Enterprise Technology Services

This award recognizes a team that works together to perform a specific function. Through the pooling of skills, talents, energy, and knowledge, they have accomplished a common goal that supports the organization's mission.

In June 2022, Governor Ige signed Act 179 which called for the development of a plan for the consolidation of information technology services and staff within the executive branch agencies. Although all executive departments were included in this project, the team members from ETS not

only took the lead and oversaw the project, but also served as facilitators and note takers/timekeepers on the twelve committees that made up the larger group.

Act 179 ETS Core Team included the following ETS employees: Rachel Faitau, Brian Frey, Bryce Fujii, Jennifer Halaszyn, Vince Hoang, Juha Kauhanen, Sonny Kekipi, Arnold Kishi, Dexter Lee, Sheryl Miyagawa, Kyle Muranaka, Michelle Muraoka, Doug Murdock, Kathleen O'Brien, Sheila Oliveira, Todd Omura, Jussi Sipola, Patrick Stuart

4.2.2. Employee of the Year Award: Michael "Mikey" Kleckner, ETS

This award is the highest departmental award that recognizes an employee for outstanding performance and/or achievements.

As Time and Attendance Analyst, Mr. Kleckner has played a crucial role in the continued process of transitioning departments into the Hawai'i Information Portal (HIP). He also provides crucial help to Central Payroll, assisting with payroll processing when they are short-handed, ensuring that we are all paid on time.

Mr. Kleckner took the initiative to compile payroll processing and year-end procedures into a document that serves as a manual for Central Payroll. This manual ensures timely and accurate processing of payroll and annual W-2 forms.

4.3. National Awards

4.3.1. Digital States Survey

For the second consecutive time, the state of Hawai'i has been ranked among the top states nationwide for IT practices receiving an overall grade of A- in the Center for Digital Government's (CDG) 2024 Digital States Survey.

The 2024 Digital States Survey evaluates states' use of technology to improve service delivery and constituent engagement, increase capacity, streamline operations and achieve other state priorities— assigning a letter grade based on quantifiable results.

The CDG said that Hawai'i maintains its A- grade in this year's survey in part due to a commitment to the fundamentals of IT modernization as well as resilience in the face of adversity, including the technological support response to the deadly Maui wildfires in 2023.

The biennial survey awards were presented during the Center for Digital Government Awards Program in September.

A national listing of all 50 states grades is available at www.centerdigitalgov.com.

4.3.2. NASCIO Awards

Three Hawai'i state departments were given National Association of State Chief Information Officers (NASCIO) 2024 State IT Recognition Awards in New Orleans October 1 for their technology project entries, including one taking the top award in the Emerging & Innovative Technologies category.

NASCIO received more than 120 submissions from its member states and territories which showcase the use of information technology to address critical business problems, more easily connect citizens to their government, improve business processes and create new opportunities that improve the lives of citizens.

- **Geospatial Decision Support System:** The Hawaiʻi State Energy Office's (HSEO) "Geospatial Decision Support System" (GDSS) tool was recognized by NASCIO as the National Award Recipient, its highest distinction for technology excellence in state government, in the Emerging & Innovative Technologies category.

  The tool was developed with a Federal Emergency Management Agency Hazard Mitigation Grant in partnership with the Hawaiʻi Emergency Management Agency, the Office of Homeland Security, Statewide GIS Program, technology company ICF and various energy businesses including Hawaiian Electric Company, PAR Hawaiʻi, Island Energy Systems, Aloha Petroleum, Hawaiʻi Gas and Hawaiʻi Fueling Facilities Corporation.

  The GDSS is a web-based mapping and data exploration tool that was built to provide end users the ability to explore, query and understand critical energy infrastructure, community lifeline key customers, and hazard data compiled throughout the development of the energy hazard mitigation project.

- **AI-Powered Statewide Branch Services Desk:** The state Department of Human Services (DHS) was selected as an Award Finalist in the Business Process Innovations category for its entry "AI-Powered Statewide Branch Services Desk" (SBSD).

  The SBSD is focused on custom technical solutions built on an AI-driven platform, balanced with people-centered attention, to integrate advanced technology into service delivery, which paves the way for streamlining several processes and maximizing efficiencies for both DHS and its clients. Having a virtual agent available 24-hours a day, 7-days a week, allows clients to easily access information.

- **Hawaiʻi's Career Acceleration Navigator:** Selected as an Award Finalist in the Cross-Boundary Collaboration & Partnerships category was the "Hawaiʻi's Career Acceleration Navigator" (HI CAN) which was developed by a cross-agency team of the Department of Labor and Industrial Relations, the Department of Human Services and ETS.

  Working with the National Governors Association Workforce Innovation Network, the team developed a comprehensive and user-friendly online service delivery hub in partnership with Research Improving People's Lives (RIPL). HI CAN is a virtual one-stop website that leverages cloud technology to provide job seekers not only with customized pathways to employment but also connects them to other services provided by the state of Hawaiʻi that can help support them and their families while looking for work.

To see the award submissions, visit: https://www.nascio.org/awards/

4.3.3. Center for Digital Government Finalist

Hawaiʻi was named a finalist in the Overall State Government Experience category at the during the GovX Summit and eight annual Government Experience Awards in September.

Presented by The Center for Digital Government (CDG), the awards recognize the achievements of states, cities and counties that have raised the bar on the experience of government services to create a better engaged constituency and a more responsive government.

5. LOOKING AHEAD TO 2025

5.1. Strategic Plan Refresh

Updating the State of Hawai'i IT Strategic Plan is a statutory requirement every four years – with an update due before the 2025 Legislative Session.

An up-to-date IT Strategic Plan provides a clear, forward-looking roadmap to align IT investments and initiatives with the state's priorities. It ensures efficient resource allocation, enhances cybersecurity, supports modernization efforts, and improves service delivery to the public.

By setting measurable goals and adapting to emerging technologies, the strategic plan maximizes operational efficiency, fosters innovation, and prepares the state to meet future demands effectively.

Starting March 2024, a project charter and project plan were established to update the state's IT Strategic Plan.

ETS ITG conducted an analysis of the success of the state's current IT Strategic Plan, which was established in 2019 and went through a minor update in 2020. This analysis was used in subsequent meetings and workshops to formulate a new IT Strategic Plan.

ETS utilized our research vendor Info-Tech to conduct separate IT strategic planning interviews and workshops with both the state's business leaders and the state's IT leaders.

In 2025, ETS will work with the executive branch departments to establish the departmental IT Strategic and Operational Plans.

5.2. Preview of Key Initiatives/Activities

[Content pending]

6. APPENDICES

Table: Applications To Be Integrated With Citizen Identity Login Services

HIC - App - Lala (eHawaii.gov User Management System)   HIC - App - Notification Center
CCHNL - Office of the City Clerk - Legislative Document Access
AG - HCJDC - Covered Offender Registry
AG - HCJDC - Bulk Covered Offender Registry
AG - HCJDC - Sex Offender Information Management System
AG - HCJDC - eCrim
DLIR - HIOSH - Inspection and Permitting System
Kauai - Finance - Real Property Tax Payments
DAGS - OIP - State Calendar System
DLIR - R&S - Green LMI
DOH - DCAB - Placard Application and Registry
DOH - TBB - Tuberculosis Control Program   DOH - TBB - Televisit
DOH - WWB - Wastewater IWS Filing
HIC - App - Gamify
HIC - App - RSS Alerts
AG - HCJDC - HIJIS Federated Query System
DBEDT - CID - Open and Accessible Film Permit
DBEDT - FTZ9 - Invoicing & Payment System
DCCA - OCP - Mortgage Foreclosure Dispute Resolution (MFDR)
DCCA - OCP - Public Sale Notice
DCCA - REB - AOAO Condominium Association Registrations
DLNR - APO - Civil Resource Violations System (CRVS)
DLNR - DAR - Freshwater Game Fishing License
DLNR - DOFAW - Commercial Vessel Permits
DLNR - DOFAW - Hunt Lottery Drawing System   DLNR - DOFAW - Hunt Lottery Registration / Hunt Application System   DLNR - Hunter Ed - Online Course Registration System
DLNR - DOFAW - Hunting Licenses
DLNR - DOFAW - Na Ala Hele Trail & Access System
DLNR - Land Div - Wiki Permits
DBEDT - Aloha Stadium Online Store   DOE - Commerce Platform
Judiciary - General - Mobile App
Judiciary - General - eBench Warrants (eBW)
Judiciary - VIPS - Volunteer in Public Services
AG - CRD - Notary Application
AG - Tax & Charities - Charity Registration Retrieval System

AG - Tax & Charities - Charity Registry
AG - Tax & Charities - Solicitor Registration
AG - Tax & Charities - Special Invoice Payment System HIC - App - Invoice System
B&F - ERS - Self-Service Benefits Portal
B&F - Unclaimed Property - Unclaimed Property Search
DAGS - SPO - HANDS - Hawai'i Awards & Notices Data System
DAGS - SPO - Hawai'i Compliance Express (HCE)
DAGS - SPO - HIePRO (eProcurement System)
DBEDT - BDSD - Enterprise Zone Forms
DOH - OMCCR - Medical Cannabis Registry
DOH - OHSM - Vital Records Ordering and Tracking System
DPS - NED - Controlled Substance Registration System
LG - General - Name Change
Appointment Service (Notary, Road Test, etc)
DBEDT - CID - Tax Credit Hub
DLNR - DOFAW - Trails Day Use Permits DLNR - DSP - Statewide Camping Reservation System Hawai'i - Parks & Recreation - Big Island Camping Permits
DOE - McKinley Community School for Adults (MCSA) Online Payments
DOE - Waipahu Community School for Adults (WCSA) Registration and Payment System
DOH - DCAB - Facility Access Plan Submission and Review System
ETS - App - eRecording
HIC - App - Payment Platform AG Collections Payments (Payment Platform) DLIR - HIOSH Payments (Payment Platform) DLNR - BOC - BOC Payment Platform Hawai'i - Liquor Control - Gross Liquor Sales Percentage Fee Kauai - Liquor Control - Gross Sales Payments (Payment Platform) DLNR - DOFAW - Tree Seedlings
Location Service (Comm Vess)
DCCA - BREG - Agent Search
DCCA - BREG - Annual Business Filings
DCCA - BREG - Business Entity List Builder
DCCA - BREG - Document Search and Ordering
DCCA - BREG - Hawai'i Business Express (HBE)
B&F - EUTF - Payment Processing
CCHNL - HPD - eBW Web Service Hawai'i - HCPD - eBW Web Service Kauai - KPD - eBW Web Service
CCHNL - Office of the City Clerk - Online Ballot Request System
DBEDT - CID - Standard Film Permit (NOT LIVE YET)
DBEDT - Energy - Solar Water Heater Variance
DLIR - HMOAB - Online Certification

DLNR - DSP - Special Use Permitting System (SUPS)	
DOH - ADAD - Clean and Sober Homes Registry	
Hawai'i - Liquor Control - Licensing & Permitting Application	
Hawai'i - Parks & Recreation - Mauna Kea Group Application	
Hawai'i - VRL - Road Test Scheduler	
HIC - App - Kala Payment Module (Stored payments)	
HIC - App - Subscriber Agreement Form	
HIC - App - Access Hawai'i Committee Document Repository System	
Kauai - Liquor Control - Licensing and Permitting	
Maui - Liquor Control - Licensing and Permitting	
DAGS - Surplus - Public Auction	
DOT - Airports - HNL Surplus Auction	

Table: Cases of Paper Used For Legacy Print Services

Month	2019	2020	2021	2022	2023	2024
January	153	105	102	84	63	62
February	60	75	136	54	48	50
March	109	88	147	68	55	50
April	81	205	119	56	57	27
May	80	133	99	58	40	69
June	77	104	105	68	49	48
July	94	173	105	63	55	60
August	71	94	85	58	64	67
September	53	128	145	56	51	36
October	101	108	16	52	53	51
November	67	120	69	69	57	
December	62	119	66	81	53	

Table: IT Portfolio Governance Metrics

Desired Outcomes	Objectives	Key IT Portfolio governance metric	7/23/2020	10/22/2020	10/28/2021	11/1/2024
Proactive and transparent portfolio planning and management through system life cycle	Engage IT Coordinators	# of applications inventoried (also track per department)	498	497	520	742
		% of applications roadmapped (also track per department)	59.0%	87.0%	86.9%	94.6%
		# of planned or active projects inventoried (also track per department)	784 *	274	299	630

		% of projects roadmapped (also track per department)	15.9% *	25.1%	55.5%	80.8%
		% of active LeanIX users logged in during the past 3 months	39.5%	34.0%	48.2%	50.0%
Transparency into cost, schedule and performance and re-baselining of projects	Manage IT project costs & cost overruns	% of active LeanIX projects with Capex and/or Opex $ values	92.8% *	83.5%	64.9%	94.2%
	Manage IT project schedule	% of active projects with at projected completion established	NA	NA	50.3%	72.3%
		% of active LeanIX projects with RAG status	14.0% *	10.2%	12.4%	14.2%
	Provide public transparency into IT projects	% of active IT projects (& project stage) visible to the public	NA	100.0%	100.0%	100.0%
IT systems are well-engineered and appropriately designed for their intended use	Advance cloud-computing	% of applications with hosting data entered	NA	NA	81.3%	94.3%
		# of cloud (IaaS, PaaS, SaaS) applications	39	72	99	360
		% of cloud applications (IaaS, PaaS, SaaS) from those with hosting data entered	NA	22.0%	23.4%	46.1%

Table: Hawaiʻi Annual Code Challenge Winners

Results	Challenge(s)	Team Name	Captain	Affiliation	Advisor
Middle/High School					
1	HMoK - Aloha Birds	Freshy	Khaen Dumbrique	Waipahu	Cindy Takara
2	Tyler - AI Concierge	Jammy	Carl James Dumbrique	Waipahu	Emily Haines-Swatek
3	HBDEO - Digital Equity	Innovate	Chelsey Miguel	King Kekaulike (Maui)	Cindy Takara
College					
1	HKM - Energy Usage	Kilowatt	Gabrielle Dang	UH Manoa	N/A
2	ETS - Portal	HEX	Jarell Ballesteros	UH Manoa	N/A

3	Tyler - AI Concierge	CGA	Grant Garrison	HPU	N/A
Professional					
1	HMoK - Aloha Birds	Code With Aloha	Michael Avendano	N/A	N/A
2	Tyler - AI Concierge	Married With Children	John Johnson	N/A	N/A
3	HMoK - Aloha Birds	Snake Snacks	Chase Lee	N/A	N/A