COMMONWEALTH of VIRGINIA

Department of Taxation

December 1, 2021

To: The Honorable Janet D. Howell
Chairwoman, Senate Finance and Appropriations Committee

The Honorable Luke E. Torian
Chairman, House Appropriations Committee

The Honorable Vivian E. Watts
Chairwoman, House Finance Committee

Pursuant to House Bill 2060 of the 2021 General Assembly Special Session I, the Department of Taxation reviewed the feasibility of developing an online portal for tax practitioners (attached). As required, the Department solicited input from practitioners as well as from selected payroll service providers in conducting this review. The report evaluates comparable services offered by the Internal Revenue Service and other state revenue agencies. In addition, the Department's review addressed cybersecurity issues as well as estimated costs and factors that affect the implementation of a provider portal.

Please contact me if you have any questions.

Sincerely,

Craig M. Burns
Tax Commissioner

Enclosure

C: The Honorable K. Joseph Flores, Secretary of Finance

CHAPTER 414

An Act to direct the Department of Taxation to analyze the prospect of establishing an online portal for tax practitioners.

[H 2060]

Approved March 30, 2021

Be it enacted by the General Assembly of Virginia:

1. *§ 1. That the Department of Taxation shall, with input from affected stakeholders, analyze the prospect of establishing an online portal for tax practitioners who possess a valid Power of Attorney and Declaration of Representative form to access confidential client information. In its analysis, the Department shall evaluate (i) comparable services offered by the Internal Revenue Service or by other states that provide electronic access to confidential taxpayer information and (ii) cybersecurity concerns associated with providing such services. The Department shall identify the estimated costs associated with creation of such a portal and report its findings and recommendations to the Chairmen of the House Committee on Appropriations, House Committee on Finance, and Senate Committee on Finance and Appropriations no later than December 1, 2021.*

Virginia Tax House Bill No. 2060

Tax Practitioners Online Portal (T-POP) Summary Report

November 2021

CapTech

Table of Contents

CapTech

PURPOSE

To support ongoing customer-first efforts by soliciting input from affected stakeholders and analyzing the prospect of establishing a Tax Practitioners* Online Portal.

Tax Practitioners: Must possess a valid Power of Attorney (POA) and Declaration of Representative form to access confidential client information.

Executive Summary

CapTech.

Establishing an Online Portal to Serve the Needs of Tax Practitioners

In response to Virginia House Bill No. 2060, Virginia Tax partnered with CapTech Consulting to analyze the prospect of establishing an online portal for Tax Practitioners.

The following presentation is a summary of the analysis and recommendations from the assessment. The assessment aimed to help Virginia Tax better understand its current relationships and offerings with Tax Practitioners, as well as serve as a roadmap for the department as it builds a more customer-centric experience for this unique stakeholder group.

Assessment Scope
House Bill No. 2060 - 2021 Session

Solicit input from affected stakeholders and analyze the prospect of establishing an online portal for Tax Practitioners.*

- Perform **research** and **evaluate comparable services** offered by the Internal Revenue Service (IRS), other states, and other agencies that provide electronic access to confidential taxpayer information

- **Evaluate cybersecurity concerns** associated with providing such services with Virginia Tax's technology and security teams

- Propose an **implementation strategy and estimates** for an Online Portal for Tax Practitioners

*Tax Practitioners: Must possess a valid Power of Attorney (POA) and Declaration of Representative form to access confidential client information.

Summary of Activities

Virginia Tax Staff Interviews

Interviewed **39 personnel across departments** to uncover challenges and opportunities related to the current Tax Practitioner experience. Themes from these interviews highlighted needs to **streamline** complicated processes, **centralize** information, and improve **communications** to better **inform** stakeholders.

Tax Practitioners Interviews and Surveys

Conducted **8 focus groups** and gathered **survey responses from 140+ Tax Practitioners**. Participants shared many of the same challenges and opportunities identified by agency staff, while expressing needs for expanded self-service capabilities to accelerate lengthy processes and reduce reliance on mail, fax, and phone.

Current State Usability Assessment

Performed a **heuristics analysis** of the current digital experience for Tax Practitioners. This analysis revealed usability concerns related to identity verification, login processes, and wayfinding.

Peer Analysis

Met with **5 states and the IRS** to see demos of existing portals for Tax Practitioners. These demos revealed unique approaches to Tax Practitioner authorizations and online experiences.

States: CA, DC, GA, IN, NY

Define and Prioritize Portal Requirements

Decomposed stakeholder needs from interviews, surveys, focus groups, and research into **components, features** and **functionality,** proposed supporting **processes,** and designed a high-level **information architecture** for the Tax Practitioner online portal.

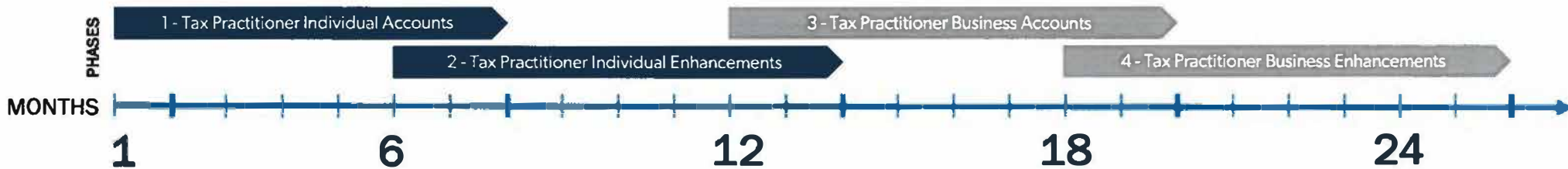### Identify and Evaluate Security Concerns

Combined research and requirements with security industry trends and analyst reports to determine the key security concerns. The most important recommendation is to add a **Customer Identity and Access Management solution** to secure the Tax Practitioner online portal.

Implementation Overview

Primary Needs and Recommended Initial Scope		Secondary Needs and Opportunities		Backlog / Lower Priority

Phase 1
Tax Practitioner Individual Accounts

USE CASES

- Registration & Profile Creation
- POA Submission
- Secure Messaging
- View Clients & Client Details
  - Payments, Transactions (e.g., Correspondence), Balance/Filing Summary Information, POA Details
- View Correspondence

Phase 2
Tax Practitioner Individual Enhancements

USE CASES

- POA Efficiency Enhancements (client approval from IOP)
- Submit Payments
- Aggregate Client Views & Alerts
- Business Portal Strategy / Plan

Phase 3
Tax Practitioner Business Accounts

USE CASES

- Secure Messaging
- View Clients & Client Details
  - Payments, Transactions (e.g., Correspondence), Balance/Filing Summary Information, POA Details

Phase 4
Tax Practitioner Business Enhancements

USE CASES

- POA Efficiency Enhancements (client approval from *iFile/BOP*)
- Submit Filings and Payments
  - Improve integration between secure messaging, eForms, and web upload for other types
- Aggregate Client Views & Alerts

Phase 5-6
Payroll Service Provider Accounts & Enhancements

USE CASES

- Reporting Agent Authorization (client approval from *iFile/BOP*)
- Registration & Profile Creation
- Firm and Member Mgmt.
- View Clients & Client Details
  - Withholding Only
- Submit Filings and Payments
  - Withholding Only

Proposed Tax Practitioner Release Schedule and Costs

Overlapping phases maximizes efficiency and allows the analysis and design teams to prepare a backlog of work for the development team to immediately execute. Alternatively, phases can be performed in a non-overlapping sequence over a longer duration if that aligns better to ongoing prioritization efforts, legislative cycles, or resource constraints at the agency.

PHASES

1 - Tax Practitioner Individual Accounts

2 - Tax Practitioner Individual Enhancements

3 - Tax Practitioner Business Accounts

4 - Tax Practitioner Business Enhancements

MONTHS

1   6   12   18   24

Estimated Cost Range

Tax Practitioner Phases	Low Estimate	High Estimate
1 - Individual Accounts	$1.6 Million	$2.0 Million
2 - Individual Enhancements	$1.6 Million	$2.0 Million
3 - Business Accounts	$1.8 Million	$2.5 Million
4 - Business Enhancements	$1.8 Million	$2.5 Million

*Pricing estimates subject to market conditions at time of projects, refined scope of phases, and several assumptions identified in detailed work estimate breakdown.

*Estimates include development and related resource costs from Virginia Tax and CapTech

*Estimates for Payroll Provider Phases is included in the Appendix and is separate from the estimates above

Release Principles

Align Priorities to Key Needs

Tax Practitioners cannot efficiently and confidently serve their clients' tax needs online without the ability to **register, request client access, and view authorized client information.** Access to "individual" clients is entirely missing and needed.

Reduce Calls, Mail, and Fax

An **online registration and POA process** will incrementally cut down mail and fax processing. Providing Tax Practitioners with client information and expanded secure messaging will increase their effectiveness and reduce call center volume for routine inquiries.

Crawl, Walk, Run

Many of the key needs of Tax Practitioners are addressed in the **core experience outlined in Phases 1 & 2**. After key needs are addressed, future phases should be weighed against other legislative priorities and modernization initiatives to maximize stakeholder value and return on investment (ROI).

Align with IRS's Access Approach

The IRS has defined an approach to online access that aligns distinct access levels to different Tax Professional use cases. **Our implementation strategy** is aligned to the IRS's approach to POA-based access control and can utilize Virginia's existing Authorized Agent registrations.

Verify Identities to Protect Customers

Leverage IRS (e.g., PTIN) and other third-party data to verify identities in the registration process. Once verified, **use multi-factor to authenticate and POAs to authorize** Tax Practitioners. Identity verification combined with ease of use is paramount to security.

Prioritize Interconnectivity

Build simplified and flexible systems that **harness cross-cutting utilities and leverage reusable services** to reduce risk and simplify testing. Decompose functional needs into modular services that are loosely coupled, highly cohesive, and allow for development and testing by teams in parallel.

COST SAVINGS ANALYSIS

—

Estimate $95,000 - $150,000 incremental annual savings based on historical data

Reducing calls and inbound POA mail / fax processing are primary drivers

Other benefits to online access (e.g., increase timely filing / payments; set up payment plans to increase collections) may increase return on investment (ROI) – but the low historical volume of outbound correspondence does not indicate significant benefit opportunities.

Agency Data on Tax Practitioners and Authorized Agents

Estimated Yearly Direct Cost Savings	Web Upload	Web Transaction
Outbound Mail (Reduce 40%)	$3,600	
Inbound Mail (Convert 50%)	$1,500	$10,500
Inbound Fax (Convert 60%)	$6,900	$52,700
Hotline Calls (Reduce 40%)	$83,500	
Total	**$95,600**	**$150,400**

Assumptions

Given there are 19,950+ currently registered Authorized Agents...

- Historical outbound mail to authorized agents is lower than expected
  - Reducing outbound mail at scale can result in significant cost savings due to costs of postage and mail processing.

- Converting inbound calls, mail processing, and fax processing to web transactions represents the largest opportunity for cost savings
  - Web uploads has minimal cost savings because a customer service representative still needs to review the upload and process the transaction
  - Savings will decrease if conversion rates fall below targets
  - Savings will increase if the number of authorized agents increases

Potential Challenges and Recommendations

Summary of Analysis & Findings

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Current Integrated Tax Processing Systems

Virginia Tax's integrated tax processing systems were implemented more than a fifteen (15) years ago, were not designed to support many online use cases, and do not expose modern interfaces or services that online systems depend on. **Modernization of these systems is the top priority at the agency** to increase nimbleness and flexibility responding to legislative requests and changes, improve the agency's overall operational efficiency and effectiveness, maximize revenue channels, and enhance security. Until modernization occurs, development against current systems carries more risk, requires more effort, and functionality may need to be replaced or reengineered when modernization occurs.

Current Tax Processing Systems Increase Complexity

- Business rules and transactions on the current integrated tax processing systems are complex, tightly coupled, and difficult for someone without a detailed knowledge of the current systems and requirements to decipher and test. Any development effort that needs to integrate with current tax processing systems carries more risk and requires more effort to validate that issues are not introduced that negatively affect tax processing.

- This complexity makes it challenging to accurately estimate the development level of effort, and implementation requires involvement and support from business subject matter experts across the agency. The best way to manage this risk is to decompose this effort into multiple release phases that prioritize the most important functionality and capabilities. Each release phase will need several workgroups and analysis sessions with policy, operations, and technology stakeholders to determine what is feasible.

- Phase two (2) and four (4) of the implementation strategy will require the most testing around the transactional enhancements being deployed because they involve "writing" the most transactions to the underlying systems.

Customer Service Change Management Impacts

This initiative aims to establish an online channel and relationship with Tax Practitioners. Specific objectives include shifting routine phone inquiry requests, mailings, and faxes to web upload and/or self-service transactions. To achieve these objectives, **Virginia Tax will need to adapt its customer service roles, processes, and technology to support enhancements** to Tax Practitioner registration, online POA requests, and secure messaging. These enhancements necessitate training and allocating customer service staff to support online channels.

Organizational Change Management Impacts

- An online portal for Tax Practitioners requires the design, development, and deployment of functionality for customer service representatives to effectively support online users. This primarily includes the development of customer service enhancements for secure messaging and POA review and approval processing.

- Customer service staff will need need considerable engagement, documentation, training, and the ability to provide feedback prior to production deployment for them to effectively embrace, adopt, and use new support capabilities. The training must focus on minimizing disclosure and policy risks associated with online communications.

- Tax practitioners are likely to continue to use their dedicated hotline(s) for urgent client tax matters due to the relatively low wait time when compared to secure messaging. However, simplified document exchange online will augment existing channels and will be more efficient and secure than mail or fax for exchange of information.

Security Analysis and Recommendations

Virginia Tax has an enterprise architecture governance framework for secure system design, development, and acquisition to assure technical solutions are in alignment with stakeholder needs, security and risk compliance, agency standards and policies, and industry best practices. This capability provides a holistic governance mechanism for the agency to enhance decision making, manage complexity, reduce technical debt, improve quality, and reduce risk.

Existing Security Policies, Practices, and Procedures Must Be Followed to Protect Taxpayer Information

- Virginia Tax has a large set of security policies, practices, and procedures in place which are effective: security design documents with reviews and approval, data classifications with corresponding security requirements, secure coding guidelines and reviews, static and dynamic code analysis tools, security and penetration testing, and more.

- The current versions of the existing Virginia Tax online technology stack used to develop the Individual Online Portal (IOP) can continue to be used for the Tax Practitioner Online Portal, and the current security policies, practices, and procedures must be followed.

New Security Recommendations for the Online Portal for Tax Practitioners

Recommend implementing the following components due to the number of Tax Practitioners in Virginia, the increased amount of data that will be accessible to practitioners, and to reduce impacts on Virginia Tax personnel.

- **Consumer Identity and Access Management (CIAM)** solution for multifactor authentication, identity verification and proofing, and other advanced account protection functions. Each Tax Practitioner must be tied to a single identity, and verification of each identity must be ironclad.

- **Internal POA Authorization Service** based on the existing business process to authorize access to clients and tax matters. Considerable analysis, development, and testing effort will need to be spent to ensure Tax Practitioners can only see authorized clients and tax matters.

Ongoing Cost Savings

Based on the historical volumes of calls, inbound mail / fax, and outbound correspondence provided by Virginia Tax, an online portal for Tax Practitioners will **save the agency an estimated $95,000.00 - $150,000.00 annually.** While these savings are considerable, they will not cover the assumed development costs and likely will be realized incrementally as stakeholder interactions gradually shift to online.

Cost Savings Analysis Supports Phased-Implementation Strategy

- The cost savings analysis strengthens the recommendation for a phased-implementation strategy that can flexibly adapt to changing priorities related to this initiative, legislative requests, and larger modernization efforts.

- A phased-approach allows Virginia Tax to evolve a long-term strategy while focusing short-term efforts on manageable scopes of work that add the most stakeholder value and reduce ongoing costs. We advise evaluating, prioritizing, and revising the proposed team, scope, and estimates after each phase using lessons learned, new analysis, and operational insights from the previous phases and other high-priority initiatives.

- **Example:** If the agency prioritizes replacing or reengineering core tax processing systems in the next several years, then the strategy for the Tax Practitioner online portal may need to change and/or phases may need to be delayed until modernization is complete to maximize stakeholder value, minimize re-work, and increase the overall return on investment (ROI) across all related initiatives.

Tax Practitioners Research

Summary of Analysis & Findings

CapTech.

Key Research Takeaways

There were three key takeaways that emerged from the Tax Practitioner research that focused on communication preferences, availability of information and resources, and top task expectations.

Tax Practitioners Desire a Digital Relationship

79% of Tax Practitioners prefer to interact with Virginia Tax through **digital channels** (primarily email and secure message) while only **32% used those same channels** this past year. Tax Practitioners perceive that digital communication will reduce delays and redundant requests for information while increasing the accuracy of information provided.

Visibility of Key Taxpayer Information

A frequent frustration of Tax Practitioners is the inability to view key taxpayer information, such as **correspondence between Virginia Tax and taxpayers, transcripts, notices, and payment information**. Allowing Tax Practitioners to manage their POAs online to view historical client information will reduce tedious context requests on customer service calls, increase timeliness of payment and notice resolution, and accelerate common workflows.

Top Tasks Tax Practitioners Expect Online

Tax Practitioners expected several tasks and client-focused activities to be **available and accessible to them online,** including **checking refund status, finding info / instructions, filing taxes, and viewing a taxpayer's information.** Prioritizing functionality for these activities will reduce duplicate efforts and online security workarounds.

Research Overview

FOCUS GROUPS

- Provides deeper understanding of pain points, tools, processes and the "why"

- 8 interviews, 1:1 or small group sessions

- 60-minute time commitment

SURVEY

- Provides broad understanding of pain points, tools, and processes, as well as an **opportunity to capture edge cases**

- 140+ participants

- <10-minute time commitment

Tax Practitioner Research Themes Overview

TRANSFORM:
Increase email/secure message capabilities and reduce reliance on mail, fax, and phone

ACCELERATE:
Reduce lengthy delays in response time, expedite POA process

EMPOWER:
Provide enhanced capabilities wherever possible to reduce duplicate efforts and workarounds, and increase compliance

SHARED STAKEHOLDER AND TAX PRACTITIONER THEMES

INFORM:
Increase transparency around status, enhance educational resources, and provide alerts and notifications

COMMUNICATE:
Provide visibility into correspondence, reduce siloed methods, and consider regulatory concerns
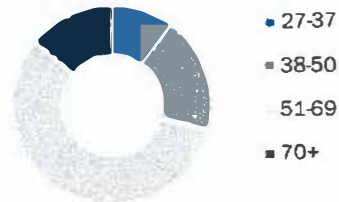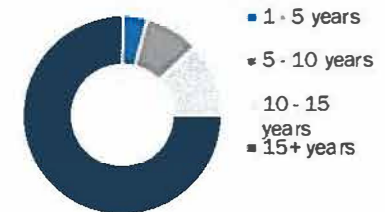
Participant Demographics

We received **140+ responses** over 3 weeks from Virginia Tax Practitioners.

Over three-quarters are seasoned professionals, with 15+ years of experience in their role.

AGE RANGES

- 27-37
- 38-50
- 51-69
- 70+

All respondents were above the age of 27, and 71% of respondents were above the age of 50.

EXPERIENCE

- 1 - 5 years
- 5 - 10 years
- 10 - 15 years
- 15+ years
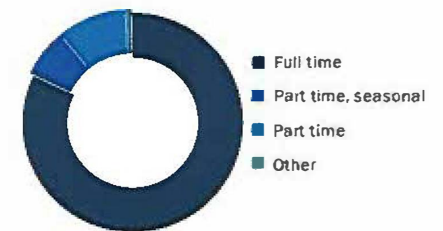
All respondents have at least 1 year of experience and 75% of respondents have over 15 years of experience in their role.

ROLE

- CPA
- EA
- Payroll Provider
- Other
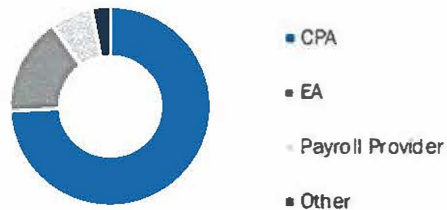
75% of respondents were CPAs and 16% were Enrolled Agents.

EMPLOYMENT STATUS

- Full time
- Part time, seasonal
- Part time
- Other
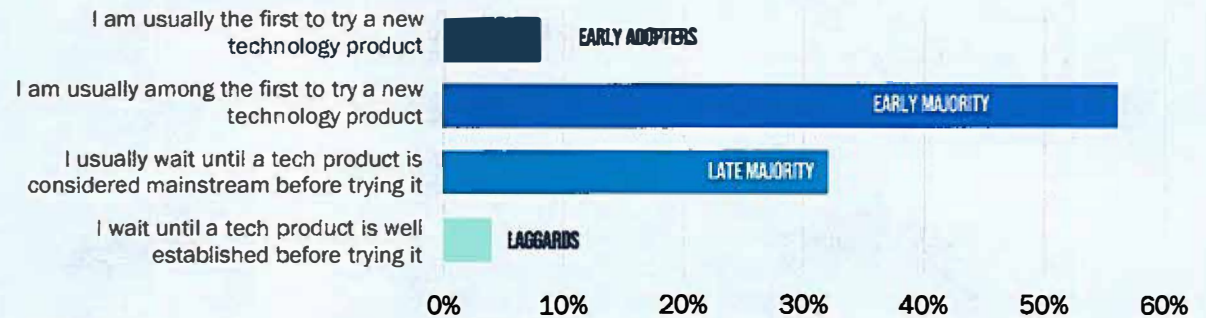
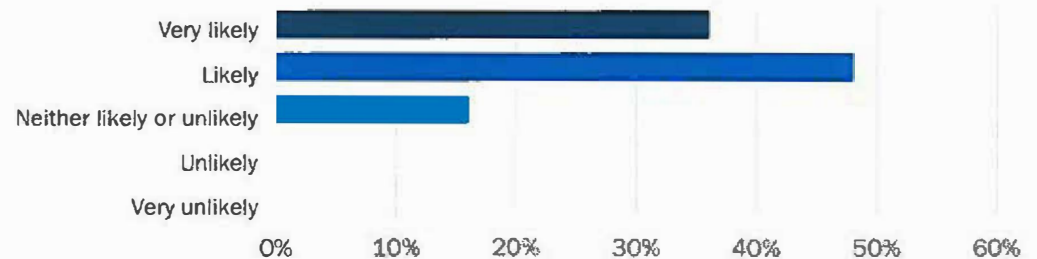82% of respondents are full time Tax Practitioners and 17% are employed in a part time capacity.

Technology Adoption

A large majority (84%) of respondents indicated they were likely or very likely to alter their methods of completing tasks if presented with new tech.

I am usually the first to try a new technology product — EARLY ADOPTERS

I am usually among the first to try a new technology product — EARLY MAJORITY

I usually wait until a tech product is considered mainstream before trying it — LATE MAJORITY

I wait until a tech product is well established before trying it — LAGGARDS

| 0% | 10% | 20% | 30% | 40% | 50% | 60% |

Q: How would you describe your willingness to try new technology products?

Very likely
Likely
Neither likely or unlikely
Unlikely
Very unlikely

| 0% | 10% | 20% | 30% | 40% | 50% | 60% |

Q: How likely are you to alter your methods of completing tasks if presented with new technologies?
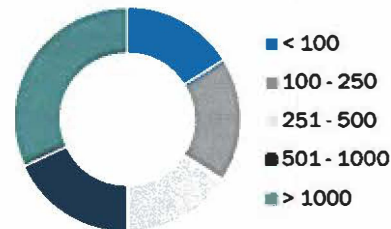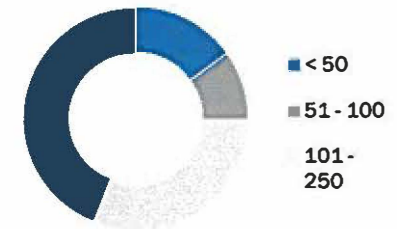
Client Demographics

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Half of all respondents work for a company that serves 500+ clients on a regular basis, and just under half personally serve over 250 clients.

The most common types of clients served are small businesses, self-employed individuals, and those married and filing jointly.
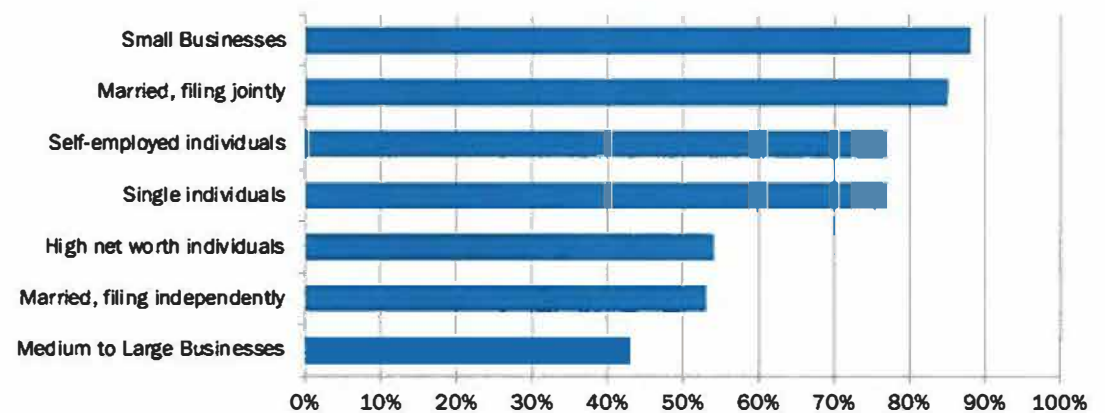

Legend:
- < 100
- 100 - 250
- 251 - 500
- 501 - 1000
- > 1000

CLIENTS BY COMPANY

50% of respondents work for companies that serve over 500 clients.

Legend:
- < 50
- 51 - 100
- 101 - 250

CLIENTS BY PROFESSIONAL

Nearly half (44%) of respondents serve over 250 clients.

Bar chart categories (top to bottom):
- Small Businesses
- Married, filing jointly
- Self-employed individuals
- Single individuals
- High net worth individuals
- Married, filing independently
- Medium to Large Businesses

X-axis: 0% 10% 20% 30% 40% 50% 60% 70% 80% 90% 100%

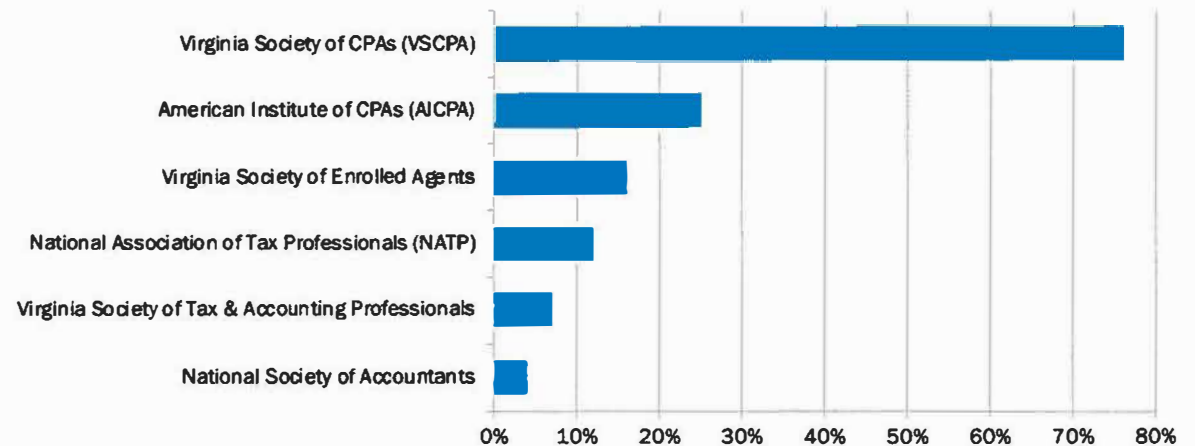## Professional Affiliations

76% of respondents are members of VSCPA and a quarter belong to the AICPA.

Organization	Percentage
Virginia Society of CPAs (VSCPA)	~76%
American Institute of CPAs (AICPA)	~25%
Virginia Society of Enrolled Agents	~16%
National Association of Tax Professionals (NATP)	~12%
Virginia Society of Tax & Accounting Professionals	~7%
National Society of Accountants	~4%

Other organizations mentioned:

- National Association of Enrolled Agents
- National Society of Accountants for Cooperatives
- ACFE
- AIIA
- ACRfA
- National Payroll Reporting Consortium
- National Association of Certified Service Providers
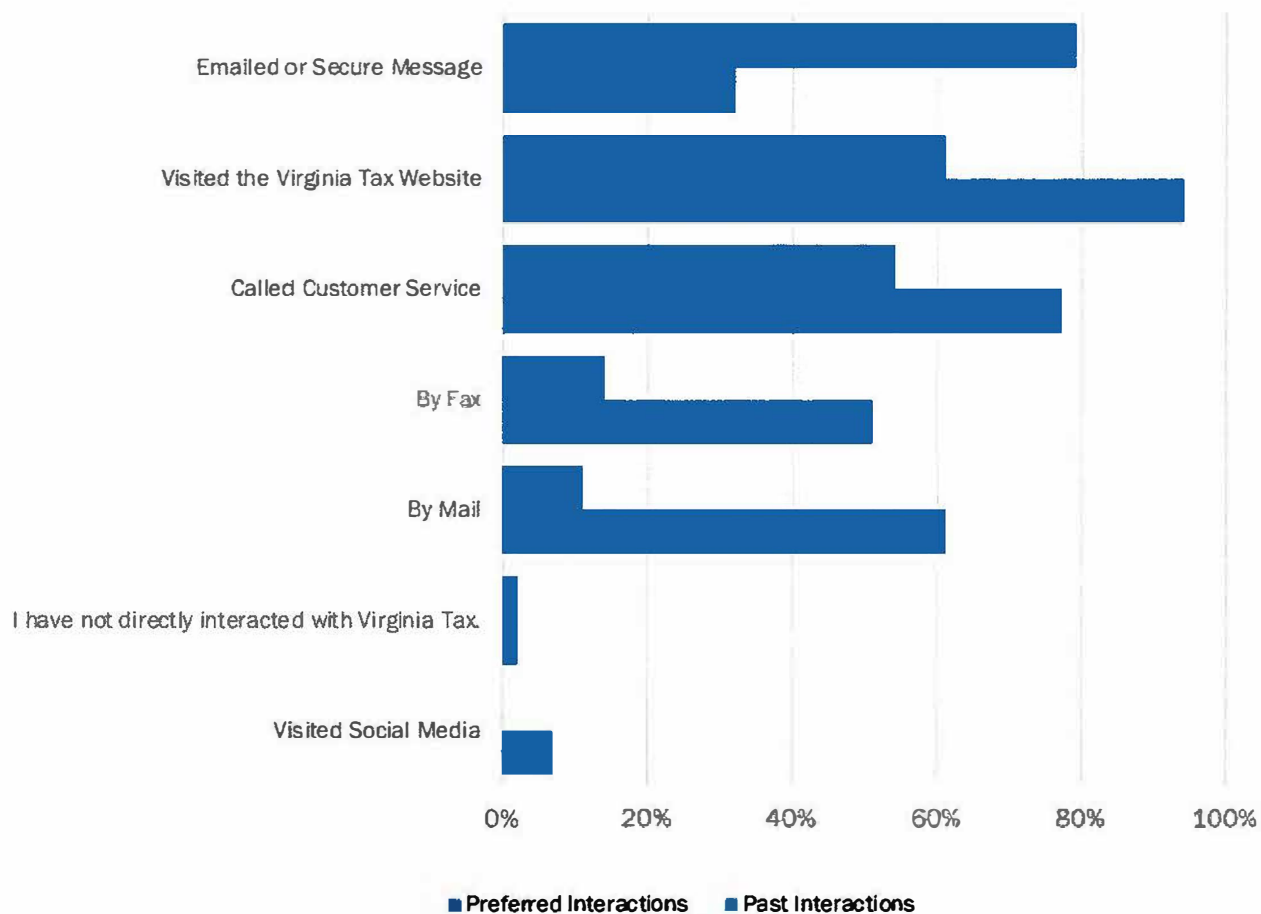- ADP
- Paychex
- HRTF

Interacting with Virginia Tax

—

79%

WANT TO
COMMUNICATE VIA
DIGITAL CHANNELS
79% of taxpayers prefer to
interact with Virginia Tax through
email or secure message while
only 32% used those same
channels this past year to
interact with Virginia Tax.

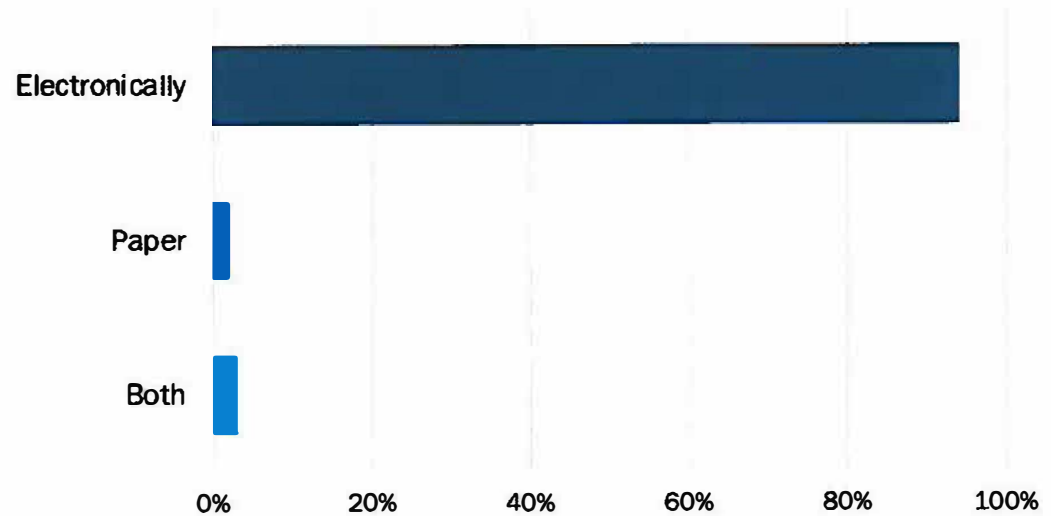Emailed or Secure Message

Visited the Virginia Tax Website

Called Customer Service

By Fax

By Mail

I have not directly interacted with Virginia Tax

Visited Social Media

0%   20%   40%   60%   80%   100%

■ Preferred Interactions   ■ Past Interactions

Filing Method

—

Nearly all respondents file their clients' taxes electronically.

Q: What is the predominant way that you **file on behalf of your clients?**

94% of respondents file **electronically,** 4% use **both methods,** and only 2% file exclusively **by paper/mail.**
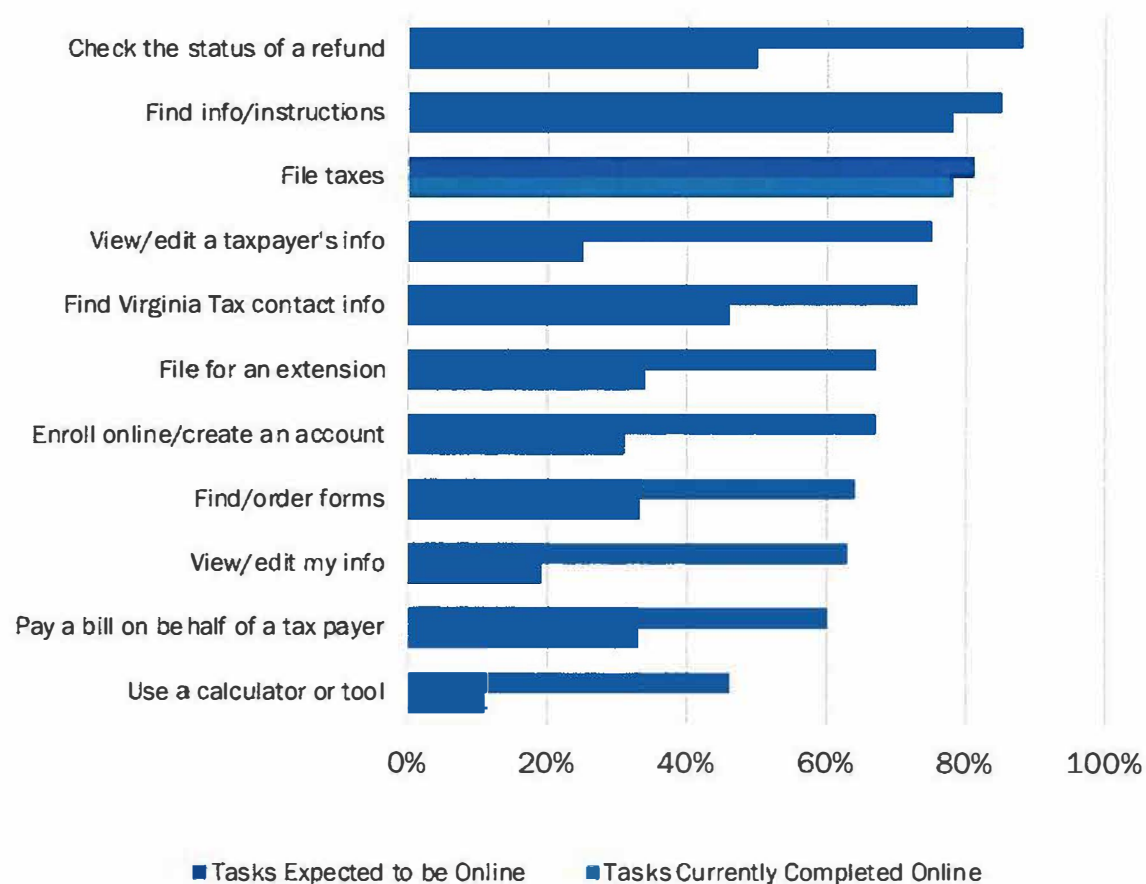
Top Tasks & Online Expectations

Tax Practitioners expect some tasks and activities to be **available online** more so than others, including:

1. Checking refund status
2. Finding info/instructions/forms
3. Filing taxes
4. Viewing a taxpayer's information

Chart categories (top to bottom):
- Check the status of a refund
- Find info/instructions
- File taxes
- View/edit a taxpayer's info
- Find Virginia Tax contact info
- File for an extension
- Enroll online/create an account
- Find/order forms
- View/edit my info
- Pay a bill on behalf of a tax payer
- Use a calculator or tool

X-axis: 0%, 20%, 40%, 60%, 80%, 100%

Legend: ■ Tasks Expected to be Online ■ Tasks Currently Completed Online

Additional Online Expectations

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Additional expectations for online transactions are focused on availability of **information** and power to take **action**.

View Information
- Verify ID numbers and/or filing frequencies for my clients
- View transcripts
- Access taxpayers account if named POA
- See if POA has been worked
- See 3-5 years of historical info
- Research client account for notice resolution
- Check estimated payments made by clients
- Pull account transcripts

Take Action
- Speak to a rep directly on behalf of a client without having to obtain POA
- File POA
- Resolve issues on behalf of taxpayers
- Protest a bill
- Resolve a tax notice; submit information to respond to a tax notice
- Request penalty waiver
- File returns without payment
- Communicate problem resolution
- Make estimated payments
- Send secure messages
- Upload documents

Top Information Needs

Tax Practitioners are looking for visibility into **correspondence, status,** and **historical information for their clients**.
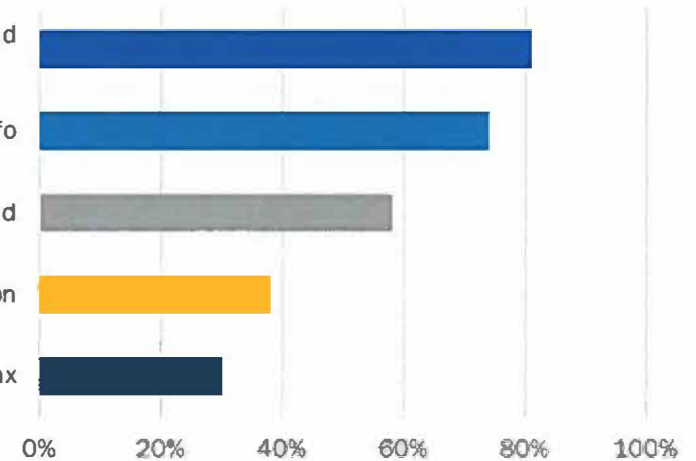

Q: What are the most important things you need to see for each of your taxpayer clients? Select up to three.

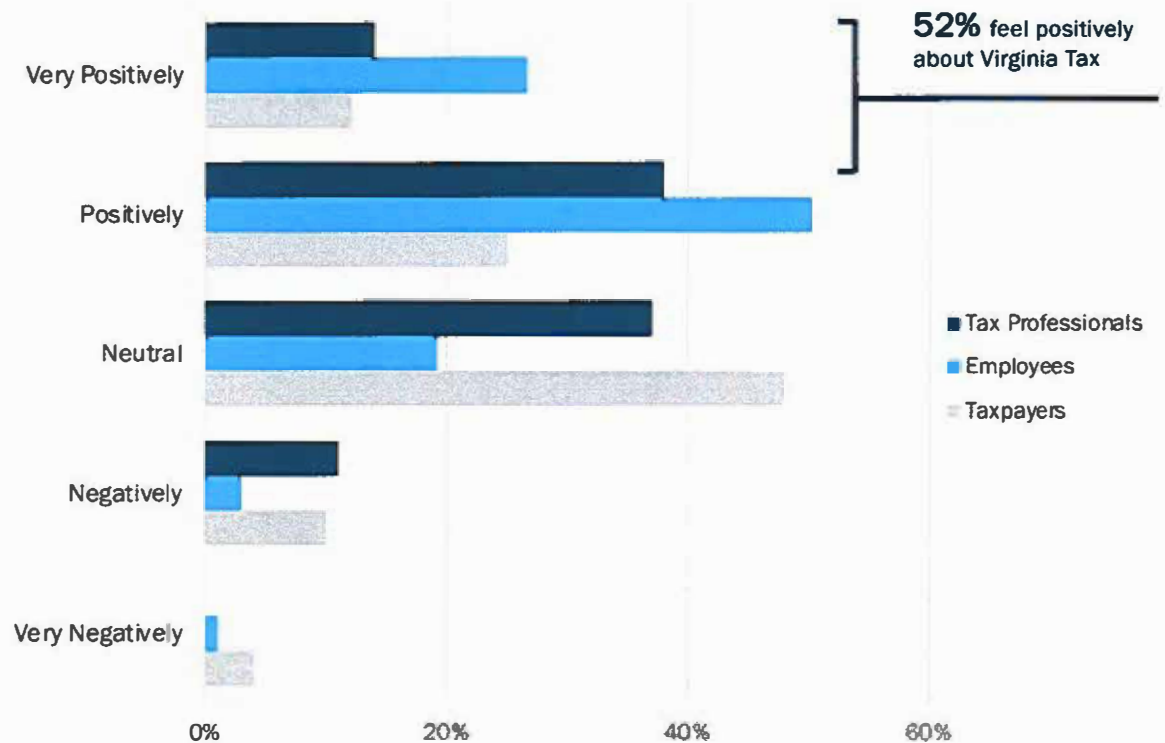## Brand Perceptions

Over half of respondents felt **positively** about Virginia Tax, which is slightly behind employees but above the perception of taxpayers.

*Employee and taxpayer data from Fall 2020 surveys

52% feel positively about Virginia Tax

- Tax Professionals
- Employees
- Taxpayers

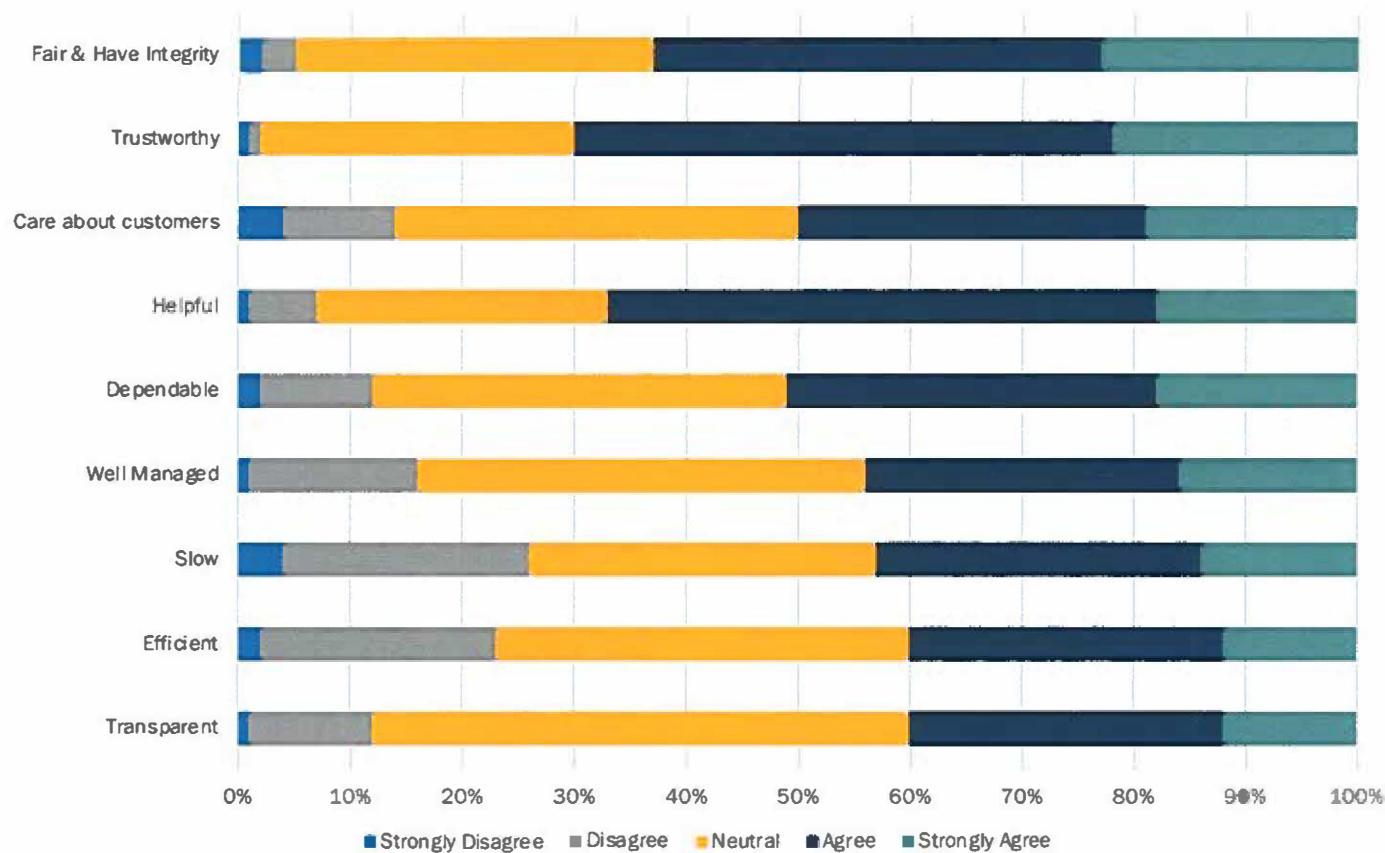Q: How do you **think and feel** about Virginia Tax?

Perceptions

Q: Please state your level of agreement with the following statements in regards to Virginia Tax.

Most respondents rated Virginia Tax positively when it came to things like **trustworthiness, helpfulness, and integrity.**

Communications & Capabilities

Horizontal stacked bar chart showing level of agreement for the following categories: Fair & Have Integrity, Trustworthy, Care about customers, Helpful, Dependable, Well Managed, Slow, Efficient, Transparent.

Legend: ■ Strongly Disagree ■ Disagree ■ Neutral ■ Agree ■ Strongly Agree

Biggest Frustrations

The most frequent frustrations identified by Tax Practitioners are around **delays in communication, limited availability of priority information,** limited self-serve functionality, and lengthy processes.

Communication
Responsiveness & Clarity

"Having to call and take time to talk to a representative instead of completing a task online"

"Lack of response, having to deal from the start many times"

- Lengthy delays and response time to requests
- Timeliness of problem resolution
- Getting in touch with someone
- Incorrect, unclear answers
- VA agent handling the call doesn't know the answer and does not call back after finding the answer
- Incomplete and unclear instructions and guidance

Availability of Information
Taxpayer & General

"Slow, lack of access to historical data"

"Tax notices/bills that are issues lack details and become a waste of time that require POA to call"

- Not being able to see detailed bill info online (once paid, the penalty and interest detail disappears)
- Not enough info in notices and communications to taxpayers
- No explanation of penalties and notices
- Difficulty in trying to get info after a client receives a notice
- Changes made in taxpayer refunds without explanation necessitating calls for answers
- Getting access to taxpayer info (even with POA)
- Not updating the rules with the Federal
- Keeping current with legislation

Biggest Frustrations

—

The most frequent frustrations identified by Tax Practitioners are around delays in communication, limited availability of priority information, limited self-serve functionality, and lengthy processes.

Online Functionality
SELF-SERVE Features & Information

"Lack of a digital relationship"

"Ability to get transcripts"

- Unable to request a penalty waiver online
- Not able to make electronic payments
- Ability to access client account
- No email capability
- Extension payments cannot be processes through tax software
- Not being able to pull an account similar to the IRS transcript system, Lack of transcript ability
- Having to have email to access clients accounts instead of SSN – older clients do not have emails
- Antiquated systems

Process
LENGTH & CLARITY

"Nothing happens fast"

"Unclear next steps"

- POA rules, verifying that I am a Tax Practitioner working on behalf on my clients
- Send notices before everything has had time to post – esp with tax credits
- Slow resolution processing
- When a return isn't processed because a client didn't respond to an ID verification letter and there is no follow up – return doesn't get processes and that affects subsequent year filings
- Time consuming POA process
- Waiver that is required for trusts
- Having to enter Late Originals on the site
- Unwilling to abate any penalties for any reason
- Wait time and finding correct contact
- Issues with married taxpayers not having separate accounts, changes in their filing statuses
- Dealing with penalty situations
- Lack of consistency

Tax Professional

40,000 est. tax professionals serving VA

> "My biggest frustration is having to call and take time to talk to a representative instead of **completing a task online.**"

AGE

71% are over the age of **50**

27-37: **10%**   38-50: **19%**

57%	51-69
14%	70+

TOP FRUSTRATIONS

- LACK OF RESPONSIVENESS & CLARITY
- LIMITED AVAILABILITY OF TAX PAYER INFO
- LENGTHY & UNCLEAR PROCESSES
- LACK OF ONLINE SELF-SERVE FEATURES

CLIENT TYPES

88% small businesses
85% married, filing jointly
77% self-employed individuals
77% single individuals

54% high net worth individuals
53% married, filing independently
43% medium to large businesses

LIKELINESS OF USING NEW TECHNOLOGIES

85% are open to altering their methods if new tech is introduced

37%	Very Likely
48%	Likely
15%	Neutral

YEARS OF EXPERIENCE

75% have over **15** years of experience

75%	15+
12%	10-15
9%	5-10
4%	0-5

CLIENTS SERVED

44% personally serve over **250** clients annually

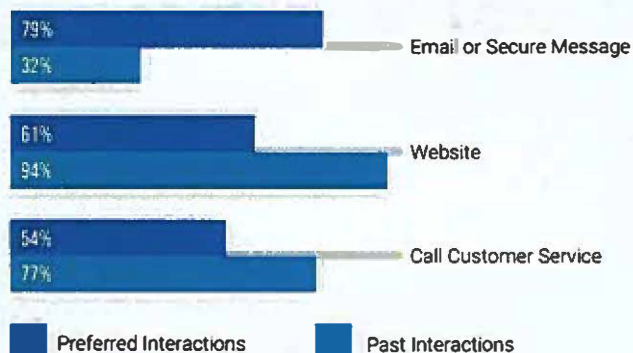|	
31%	101-250
10%	50-100
15%	<50

USE CASE #1

Establish a Digital Relationship

WISHLIST

1. Clear communication and status updates from Virginia Tax along the way
2. Secure message center with document upload

TOP COMMUNICATION CHANNELS

79% want to communicate via digital channels

79%	32%	Email or Secure Message
61%	94%	Website
54%	77%	Call Customer Service

■ Preferred Interactions ■ Past Interactions

FILING

94% ELECTRONIC	2% PAPER	4% HYBRID

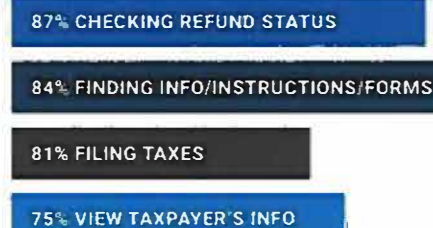Increase efficiency and speed of tasks/processes

USE CASE #2

Simplify Processes to Increase Compliance

WISHLIST

1. File POA electronically
2. Manage outstanding bills and set up payment plans online to remediate late or missing payments
3. Manage users/members within an organization- register new members, enroll existing users, update member assignments, and remove members

TOP TASKS EXPECTED TO BE ONLINE

- 87% CHECKING REFUND STATUS
- 84% FINDING INFO/INSTRUCTIONS/FORMS
- 81% FILING TAXES
- 75% VIEW TAXPAYER'S INFO

Provide online self-serve options to encourage process and procedure compliance, reduce customer service inquiries, increase adoption
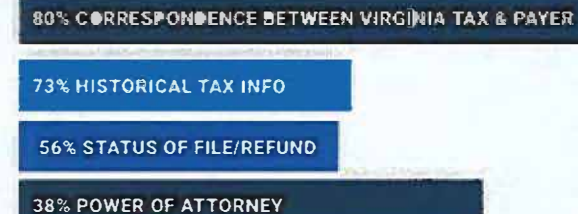
USE CASE #3

Communicate & Inform

WISHLIST

1. View transcripts, filings, payments, refund status, and correspondence from Virginia Tax to the taxpayer
2. View alerts for upcoming or modified deadlines, outstanding bills
3. Gain access to taxpayer historical information
4. View estimated payments

TOP INFORMATION NEEDS

- 80% CORRESPONDENCE BETWEEN VIRGINIA TAX & PAYER
- 73% HISTORICAL TAX INFO
- 56% STATUS OF FILE/REFUND
- 38% POWER OF ATTORNEY

Allow Tax Professionals to support clients in an efficient manner and proactively solve problems

State & IRS Research

Summary of Analysis & Findings

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Tax Agency Analysis

State of California Franchise Tax Board

Georgia Department of Revenue

Indiana Dept. of Revenue

DC Office of Tax & Revenue

New York State Dept. of Taxation and Finance

Internal Revenue Services

Virginia Employment Commission

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Client Account Access Options

Indiana

Tax Practitioner requests third-party access through online portal. Client receives notification of the request and approves or denies online.

California*

Tax Practitioner fills out the POA document and has the option to upload a signed copy or send in a request for taxpayer approval.

Georgia

Tax Practitioner can add a client to their online account through a third-party verification process.

New York

Tax Practitioner can add a client to their online account through a third-party verification process and must keep a copy of authorization forms to make available to the Tax Department upon request.

Washington D.C.

Tax Practitioner requests third-party access through online portal. Client receives notification of the request and approves or denies online.

IRS*

[Future] Tax Practitioner submits POA request online. Taxpayer receives notification of the request and approves or denies online.

Findings From Completed State Demos

Features	Indiana	California	Georgia	New York	D.C.	IRS
Electronic POA and/or POA Upload	X	X	X	X	X	X
Secure messaging and/or online chat	X	X	X	X	X	X
Access to multiple customers through one sign on	X	X	X	X	X	X
View and respond to correspondence	X	X	X	X	X	X
File returns/refunds	X	X	X	X	X	X
Make payments	X	X	X	X	X	X
View return and payment history	X	X	X	X	X	X

*Approaches to implementing features and displaying information varies significantly across states, but the core experience is very similar. Access to features and information may require online third-party authorization that is distinct from POA authorizations in several states.

State Analysis

The **state analysis** is a way to evaluate the way other states have executed online Tax Practitioner portals. By comparing different features across many states and agencies we can identify the most common processes.
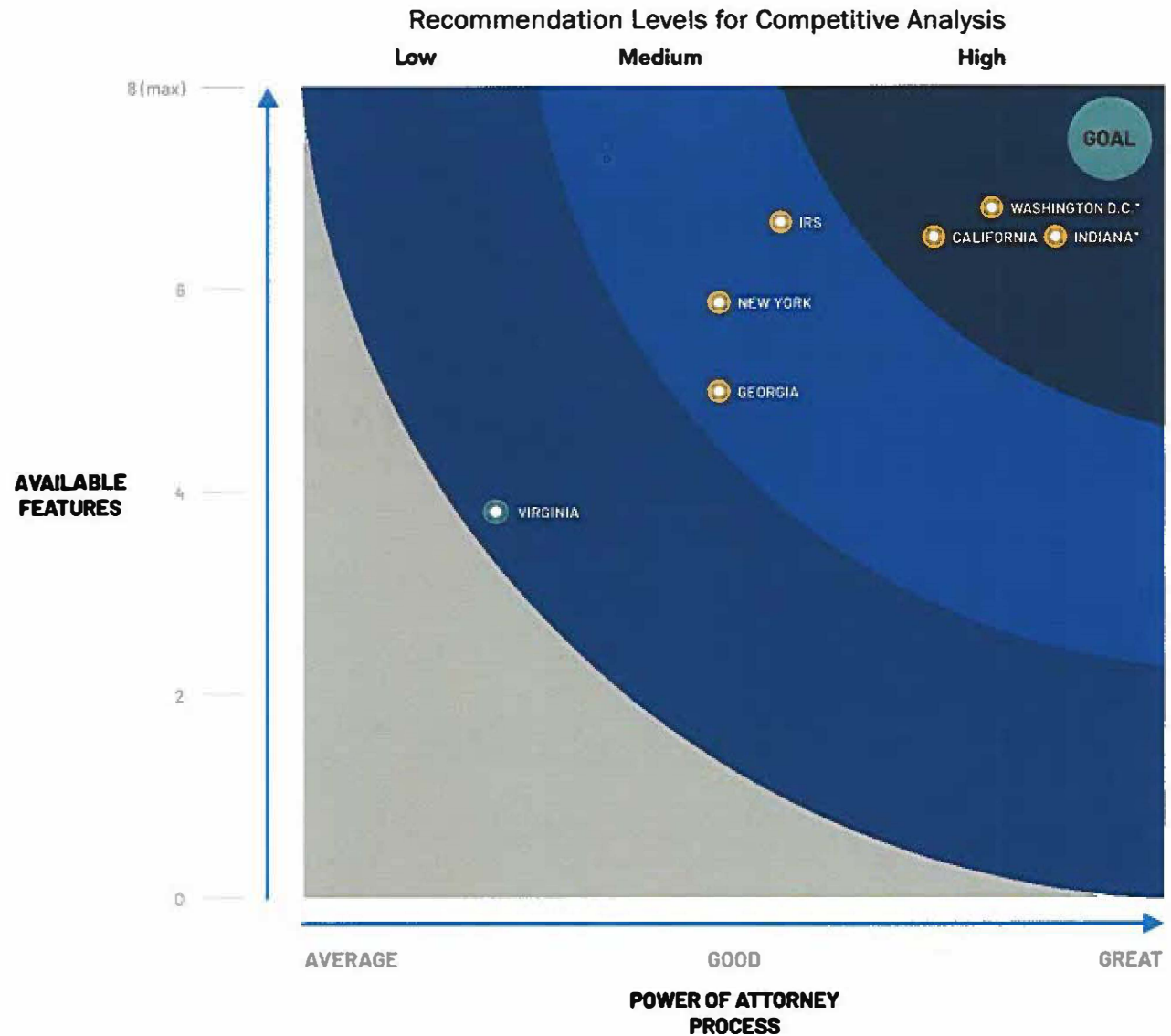
STATE ANALYSIS IS USED FOR:

- Understanding how other states provide client access to their authorized Tax Practitioners
- Comparing how different states implement each of the high priority features we identified through stakeholder focus groups

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State comparison

Matrix of Available Features and Ease of Access

Legend:
*GenTax States

Recommendation Levels for Competitive Analysis

Low   Medium   High

GOAL

WASHINGTON D.C.*
CALIFORNIA   INDIANA*
IRS
NEW YORK
GEORGIA
VIRGINIA

AVAILABLE FEATURES

8 (max)
6
4
2
0

AVERAGE   GOOD   GREAT

POWER OF ATTORNEY PROCESS

Internal Stakeholder Interview Themes

Summary of Analysis & Findings

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Virginia Tax Internal Stakeholder Interview Themes
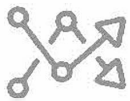
INFORM:
Increase transparency around status, enhance educational resources, and provide alerts and notifications

CENTRALIZE:
Ability to view client status "at a glance", consolidate resources, features, permissions, and information

COMMUNICATE:
Provide visibility into correspondence, reduce siloed methods, and consider regulatory concerns

STREAMLINE:
Reduce lengthy and inefficient processes and their associated complexities

Honorable Mentions

SECURE:
Ensure functionality and workflows align with latest regulations to avoid data breaches

CREATE VALUE:
Virginia Tax is responsive and dedicated to its users and our team takes pride in being a part of that

Getting Insights from Stakeholder Interviews

Engaging with stakeholders and users helps identify what will make the project successful, as well as ensure potential problems are heard and understood.

INTERVIEW SUMMARY

We met with **39 members of your team** to uncover challenges and opportunities with the current Tax Practitioner experience and workflow(s) as it relates to the users and their needs. Stakeholders were also asked about their goals and vision for the Tax Practitioner Portal project.

8 Sessions

2 CURRENT STATE Application Demos

39 Virginia Tax Stakeholders INTERVIEWED

4 Key Themes

Inform

To effectively serve their clients, Tax Practitioners need the ability to view and receive updates about important matters related to their clients such as due dates, filing frequency changes, estimated payments, outstanding bills, and legislative changes. When a client is under review, Tax Practitioners want to know where they are in the review process, instead of the standard response, "this is a multi-stage process."

PORTAL OPPORTUNITIES

- Provide clear status updates on taxpayers, accounts, filings, and issue resolution

- Highlight important "events" - e.g., Bad Address, Bill Notice, Late, Tax Due, etc.

- Display prominent alerts, notifications, and top tasks, with the ability to opt in/out at a client and/or account level

"95% of what Tax Practitioners want is status information."

- Tax Practitioners want a portal where they can see the tax matters and correspondence they have been authorized to see based on their established Power of Attorney (POA).
  - Tax Practitioners lost access to their "individual" clients' accounts when the Individual Online Portal (IOP) went live, and the information on iFile does not use POA.

- Tax Practitioners want to know the latest tax news/deadlines
  - Proactively provide information about new legislation, tax rules, form updates, and important due dates (e.g., Litter Tax)

- Provide clear and easy access to top tasks that require attention, FAQ, help guides, and any educational resources that support task completion

Communicate

Tax Practitioners require access to copies of correspondence history between Virginia Tax and the taxpayer to eliminate tedious communication and reduce the risk of missing deadlines.

The ability to easily share documentation with Virginia Tax is a crucial element of a Tax Practitioner's workflow.

PORTAL OPPORTUNITIES

- Enhance methods of communication: email (or secure messaging that functions like email), chat, file upload

- Ability for Tax Practitioners to view authorized correspondence history between Virginia Tax and the taxpayer

" The best relationship a taxpayer can have with the tax department is one where they don't speak to the tax department."

- Tax Practitioners' business is all about representing the taxpayer; requiring the Tax Practitioner to call the agency and authenticate at multiple points in the process adds frustration and delays for routine inquiries.

- The current set up is more of a one-way interaction initiated by Tax Practitioners; they call Virginia Tax for status information and other relevant updates about a client's tax circumstances

    - Reasons for reaching out can be very specific, situational, and complex

    - When Tax Practitioners find a dedicated phone number or email, they use it

- "Paper trails" for communications are important for all parties involved – and Tax Practitioners currently must rely on mail and fax channels to get the information they need instead of electronic versions of the documents

Centralize

Tax Practitioners require the ability to view high-priority status information for all their clients in an easily scannable and searchable environment. They then need the ability to drill into each client for more information and actionable insights.

PORTAL OPPORTUNITIES

- High-level dashboard with relevant information for the Tax Practitioner across all clients

- Ability to navigate between clients

- Ability to manage potentially hundreds of clients

WHAT WE LEARNED

" We should be able to give them [Tax Practitioners] a lot of the information they need at a glance."

- Tax Practitioners need to quickly view the status of their clients, and if any matters require their attention from a centralized location – new correspondence, alerts & key events, notifications, taxpayer information, account information, and their POAs for authorized tax matters.

  - Not being able to centrally view and proactively manage POAs is a pain point that causes additional work and costs precious time

- Key features commonly requested for a single solution across all clients: address change feature, view payment history, correspondence history, bill notices, return adjustments, estimated payments, filings, lien notices, prior year transcripts, appeals and rulings, educational and information resources (i.e., most everything they need to do for their clients)

Streamline

Information exists across many disparate forms, pages, applications, and behind lengthy processes. Tax Practitioners spend unnecessary time searching for key information and multiple logins to navigate between clients. Onboarding a new pro and/or sharing information with an authorized colleague often requires time spent on a call from Tax Practitioners, taxpayers, and Virginia Tax.

PORTAL OPPORTUNITIES

- Simplify registration to reduce contacts and integrate individual and business clients

- Clear, consistent, and simplified terminology, language, navigation, and site map that focuses on what needs to be done rather than how a process is performed (e.g., eForm, iFile, web upload)

- More integrated experience between online offerings for authenticated Tax Practitioners

WHAT WE LEARNED

" Everything feels like a very lengthy process."

- It currently can take many calls / interactions to get a Tax Practitioner access to the materials needed (sometimes a year+)
  - POA process is *the* barrier to getting an answer or not getting answer, and causes a disconnect between Virginia Tax, Tax Practitioners, and taxpayers
  - Fax is the "fastest" (and only) way to send timely information related to POA - but many customers haven't faxed in years
  - Tax Practitioners want to see more continuity between federal and state processes

- eForm is cumbersome for repeat customers – they must enter information each time and eForms are not integrated on iFile
  - High risk for human error; limited validations / logical checks

- Registration vs enrollment vs individual vs business relationship vs eForm vs web upload is very confusing and causes calls & after-hours work

Appendix

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Implementation Strategy

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Customer First Project Charter
Tax Practitioners Online Portal

Who is this project is meant to serve?
- Tax Practitioners, including Enrolled Agents, CPAs, and Attorneys*

What are their high-level needs?
- Securely access authorized client information and tax matters, including correspondence
- Submit filings and payments on clients' behalf
- View status of requests and time-sensitive matters that need attention

What customer problem(s) is this project attempting to solve?
- Complex registration and multiple filing options causes confusion and wastes time
- No access to individual clients' information, and incomplete access to business clients
- Difficult to check on the status of an ongoing process or request online
- Challenging to submit hard-copy artifacts and set up Power of Attorney (POA) in a timely fashion
- Business iFile does not integrate with Authorized Agent information and POA authorizations

What would success look like?
- Tax Practitioners can efficiently and confidently serve their clients' tax needs online.

How will we measure success?
- Decreased calls to the Hotline, Customer Service, and Policy Analysts for routine requests
- Reduced mail and fax volume and a shift to secure web submission, messaging, and notifications
- Increased use of the website and more self-service through the new portal

* Payroll Service Providers (PSPs) were also included in research and engaged for feedback during this project. PSPs do not represent clients using a POA and need a "Reporting Agent Authorization" access level that does not currently exist in Virginia.
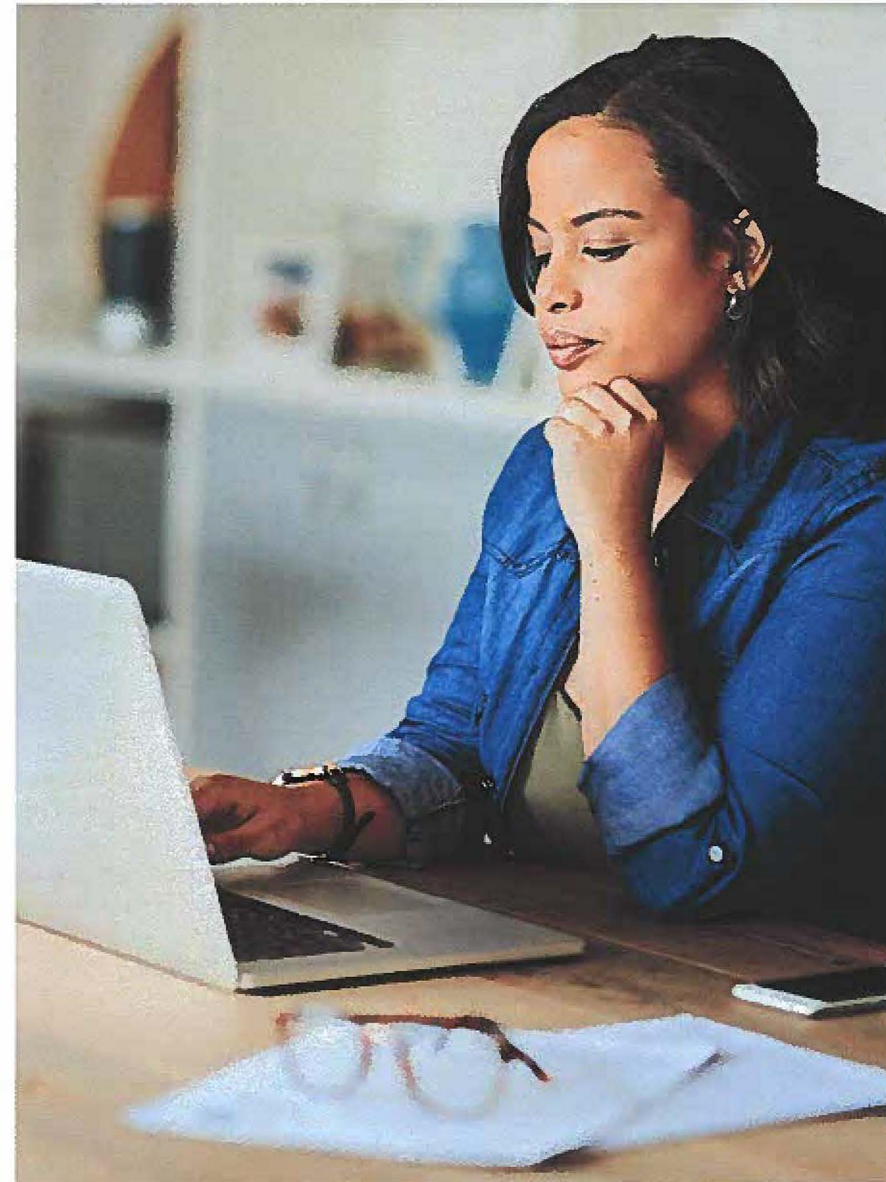
Roadmap & Estimates

—

We recommend implementing the online portal for Tax Practitioners in manageable phases to address the most pressing stakeholder needs, while minimizing risks associated with development against Virginia Tax's current tax processing systems. The first two phases aim to address the immediate needs of Tax Practitioners and are primarily focused on management of POAs and individual client accounts, which are not currently available online. If subsequent phases are pursued, then they will expand on the design and functionality of the preceding phases to gradually bring business enhancements to the POA process and the ability to manage business clients accounts on a consolidated Tax Practitioner portal instead of the separate Business (iFile) portal.

Phase 1

POA & Tax Practitioner Individual Accounts

Establish online relationship with Tax Practitioners and provide access to individual client accounts.

Estimate (Hours): **~13,200**

Phase 3

Tax Practitioner Business Accounts

Expand Tax Practitioner's access to view business client accounts from their consolidated profile.

Estimate (Hours): **~13,800**

Phase(s) 5-6

Payroll Service Provider Accounts

Add reporting agent access for Payroll Service Providers to manage their business clients

Estimate (Hours): **~15,200 - 24,000**

TIMELINE TO BE DETERMINED

Primary Needs and Recommended Initial Scope | Secondary Needs and Opportunities | Backlog / Lower Priority

Phase 2

Tax Practitioner Individual Enhancements

Add alerts, streamlined POA, and payment options for individual client accounts

Estimate (Hours): **~13,400**

Phase 4

Tax Practitioner Business Enhancements

Add alerts and payment options for business client accounts.

Estimate (Hours): **~15,000**

Release Principles

Align Priorities to Key Needs

Tax Practitioners cannot efficiently and confidently serve their clients' tax needs online without the ability to **register, request client access, and view authorized client information.** Access to "individual" clients is entirely missing and needed.

Reduce Calls, Mail, and Fax

An **online registration and POA process** will incrementally cut down mail and fax processing. Providing Tax Practitioners with client information and expanded secure messaging will increase their effectiveness and reduce call center volume for routine inquiries.

Crawl, Walk, Run

Many of the key needs of Tax Practitioners are addressed in the **core experience outlined in Phases 1 & 2.** After key needs are addressed, future phases should be weighed against other legislative priorities and modernization initiatives to maximize stakeholder value and return on investment (ROI).

Align with IRS's Access Approach

The IRS has defined an approach to online access that aligns distinct access levels to different Tax Professional use cases. **Our implementation strategy** is aligned to the IRS's approach to POA-based access control and can utilize Virginia's existing Authorized Agent registrations.

Verify Identities to Protect Customers

Leverage IRS (e.g., PTIN) and other third-party data to verify identities in the registration process. Once verified, **use multi-factor to authenticate and POAs to authorize** Tax Practitioners. Identity verification combined with ease of use is paramount to security.

Prioritize Interconnectivity

Build simplified and flexible systems that **harness cross-cutting utilities and leverage reusable services** to reduce risk and simplify testing. Decompose functional needs into modular services that are loosely coupled, highly cohesive, and allow for development and testing by teams in parallel.
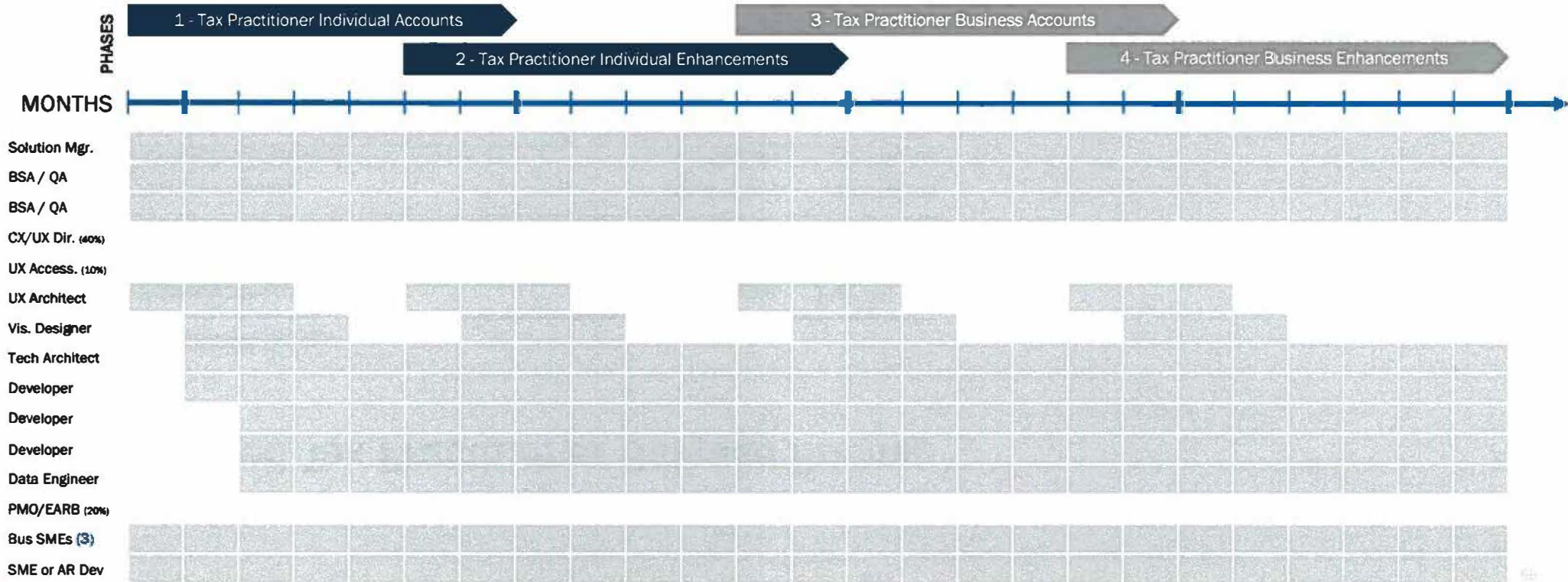
Implementation Overview

Primary Needs and Recommended Initial Scope	Secondary Needs and Opportunities	Backlog / Lower Priority

Phase 1
Tax Practitioner Individual Accounts

USE CASES

- Registration & Profile Creation
- POA Submission
- Secure Messaging
- View Clients & Client Details
  - Payments, Transactions (e.g., Correspondence), Balance/Filing Summary Information, POA Details
- View Correspondence

Phase 2
Tax Practitioner Individual Enhancements

USE CASES

- POA Efficiency Enhancements (client approval from IOP)
- Submit Payments
- Aggregate Client Views & Alerts
- Business Portal Strategy / Plan

Phase 3
Tax Practitioner Business Accounts

USE CASES

- Secure Messaging
- View Clients & Client Details
  - Payments, Transactions (e.g., Correspondence), Balance/Filing Summary Information, POA Details

Phase 4
Tax Practitioner Business Enhancements

USE CASES

- POA Efficiency Enhancements (client approval from *iFile/BOP*)
- Submit Filings and Payments
  - Improve integration between secure messaging, eForms, and web upload for other types
- Aggregate Client Views & Alerts

Phase 5-6
Payroll Service Provider Accounts & Enhancements

USE CASES

- Reporting Agent Authorization (client approval from *iFile/BOP*)
- Registration & Profile Creation
- Firm and Member Mgmt.
- View Clients & Client Details
  - Withholding Only
- Submit Filings and Payments
  - Withholding Only

Proposed Tax Practitioner Release Schedule

Full time
Part time
Primary Needs
Secondary Need

Overlapping phases maximizes efficiency and allows the analysis and design teams to prepare a backlog of work for the development team to immediately execute. Alternatively, phases can be performed in a non-overlapping sequence over a longer duration if that aligns better to ongoing prioritization efforts, legislative cycles, or resource constraints at the agency. If duration increases and resource allocation rates are not maintained, then the result will most likely be higher levels of effort, more bottlenecks with less productivity, and increased costs. The team below will operate between ~2,100 and ~2,500 hours per month by month three (3) when the development team is fully engaged.

PHASES

1 - Tax Practitioner Individual Accounts

3 - Tax Practitioner Business Accounts

2 - Tax Practitioner Individual Enhancements

4 - Tax Practitioner Business Enhancements

MONTHS

Solution Mgr.
BSA / QA
BSA / QA
CX/UX Dir. (40%)
UX Access. (10%)
UX Architect
Vis. Designer
Tech Architect
Developer
Developer
Developer
Data Engineer
PMO/EARB (20%)
Bus SMEs (3)
SME or AR Dev

Proposed Tax Practitioner Release Pricing

Estimated Cost Range

Tax Practitioner Phases	Low Estimate	High Estimate
1 - Individual Accounts	$1.6 Million	$2.0 Million
2 - Individual Enhancements	$1.6 Million	$2.0 Million
3 - Business Accounts	$1.8 Million	$2.5 Million
4 - Business Enhancements	$1.8 Million	$2.5 Million

*Pricing estimates subject to market conditions at time of projects, refined scope of phases, and several assumptions identified in detailed work estimate breakdown.

*Estimates include development and related resource costs from Virginia Tax and CapTech

Security Analysis and Recommendations

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Security Analysis and Recommendations

Virginia Tax has an enterprise architecture governance framework for secure system design, development, and acquisition to assure technical solutions are in alignment with stakeholder needs, security and risk compliance, agency standards and policies, and industry best practices. This capability provides a holistic governance mechanism for the agency to enhance decision making, manage complexity, reduce technical debt, improve quality, and reduce risk.

Existing Security Policies, Practices, and Procedures Must Be Followed to Protect Taxpayer Information

- Virginia Tax has a large set of security policies, practices, and procedures in place which are effective: security design documents with reviews and approval, data classifications with corresponding security requirements, secure coding guidelines and reviews, static and dynamic code analysis tools, security and penetration testing, and more.

- The current versions of the existing Virginia Tax online technology stack used to develop the Individual Online Portal (IOP) can continue to be used for the Tax Practitioner Online Portal, and the current security policies, practices, and procedures must be followed.

New Security Recommendations for the Online Portal for Tax Practitioners

Recommend implementing the following components due to the number of Tax Practitioners in Virginia, the increased amount of data that will be accessible to practitioners, and to reduce impacts on Virginia Tax personnel.

- **Consumer Identity and Access Management (CIAM)** solution for multifactor authentication, identity verification and proofing, and other advanced account protection functions. Each Tax Practitioner must be tied to a single identity, and verification of each identity must be ironclad.

- **Internal POA Authorization Service** based on the existing business process to authorize access to clients and tax matters. Considerable analysis, development, and testing effort will need to be spent to ensure Tax Practitioners can only see authorized clients and tax matters.
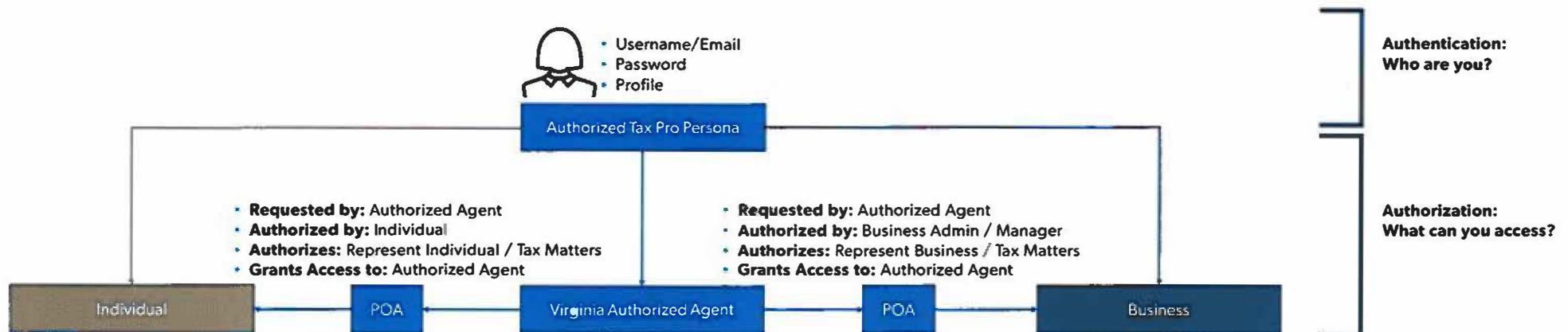
Security Conceptual Architecture

This diagram provides an overview of the authentication and authorization conceptual architecture.

User

Authentication

Identity Provider (IdP)

- User store
- User flows and policies
- Logging and Auditing
- Advanced Account Protection

Perform Actions

Virginia Tax Network Boundary

- Role-based access control (page, field level)
- Standard secure coding enforcement

Tax Professional Portal

Tax Account Access

Action Authorization

Authorization Service

- POA Store (User, Individual / Business, and Tax Accounts authorized)
- User roles (based on POA and account type)

Security - Authentication and Authorization

The Tax Practitioner portal will need to address both Authentication and Authorization functions.

- Username/Email
- Password
- Profile

Authorized Tax Pro Persona

Authentication: Who are you?

Authorization: What can you access?

- **Requested by:** Authorized Agent
- **Authorized by:** Individual
- **Authorizes:** Represent Individual / Tax Matters
- **Grants Access to:** Authorized Agent

- **Requested by:** Authorized Agent
- **Authorized by:** Business Admin / Manager
- **Authorizes:** Represent Business / Tax Matters
- **Grants Access to:** Authorized Agent

Individual → POA → Virginia Authorized Agent → POA → Business

Security - Authentication

As part of the Tax Practitioner Portal, identity verification (authentication) combined with ease of use is paramount.

Security Requirements

- One Individual == One Account

- Ironclad verification of an individual's identity

- Support for standards: Open ID Connect, OAuth 2.0, and SAML

- Advanced account protection with multi-factor authentication (MFA), password lockout with exponential backoff, risk scoring based on account activity, privileged account access or sensitive function one-time passcodes, and detailed logging & auditing

- Potentially leverage social IDs to increase security by reducing the number of Tax Practitioner un/pw's

User Experience Requirements

- Security-related screens must be highly customizable and implement the desired Virginia Tax branding

- Ability to create custom user flows based on various conditions and the desired user experience

- Ability to easily sign-up, be verified, and get started without having to wait for a PIN in the mail

Recommendation

- To support these requirements and to provide additional capabilities in the future, CapTech **recommends implementing a Consumer Identity and Access Management (CIAM)** solution (a CIAM is a third-party SaaS-based Identity Provider (IdP))

  - Examples include AWS Cognito, Azure AD B2C, and Okta Customer Identity

  - Similar functionality could be developed in-house, but at a far greater cost than these cloud-based solutions

Security - Authorization

Authorization for Tax Practitioners to access client records will be driven by the POA business process*.

POA Business Process - Security Impacts

- POAs will authorize a specific Tax Practitioner access to a specific person or business's specific tax accounts

- An authorization service (or microservice) will be built to enable developers to easily implement the appropriate authorizations without worrying about future POA business process changes or specific technical implementation details

Implementation Notes

- Most of the data already exists, it needs to be consolidated and made easily accessible

- As the intersection of Tax Practitioner, individual or business, and tax accounts is likely to be large, the service will need to be properly architected and designed for high availability, scalability, and fast response times

- Due to the potential size of the number of accounts a Tax Practitioner may have access to, this information likely will require a real-time call to the authorization service instead of storing as part of the IdP claims

* This design pattern will also work for additional access levels such as the Tax Information Authorization or Reporting Agent Authorization.

Signup Process with SaaS IdP and 3rd Party Proofing

Example process flow with identity proofing verification.*
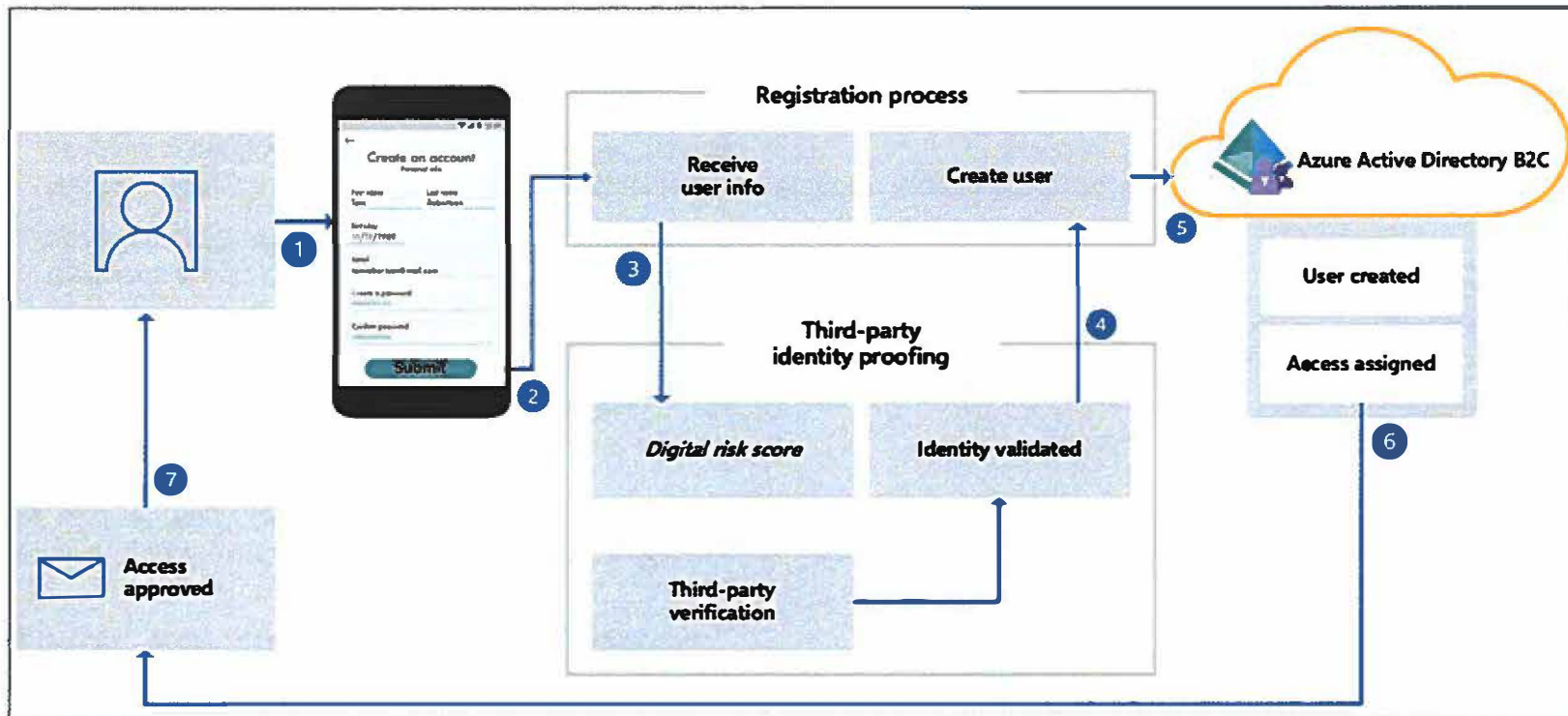
* Example is from Azure Active Directory B2C but is similar across the identified tools (AWS, Azure, Okta).

CIAM Vendor Solution Space

Forrester and Gartner rank major vendors in the CIAM space. The most recent Forrester Wave and Gartner Magic Quadrant figures, from October 2020 for both, are reproduced on the right.

A couple of notes relative to the analyst reports:

- Okta is acquiring Auth0, so one would expect the new Okta positioning to incorporate Auth0's historically strong developer and integration focus.

- Gartner's Magic Quadrant for Access Management includes full-spectrum (all identity and access management), not just CIAM.

- Neither analyst firm listed AWS Cognito or Google Cloud Platform Identity Platform. Both offer solid functionality and capabilities in the CIAM space.

THE FORRESTER WAVE™
Customer Identity And Access Management
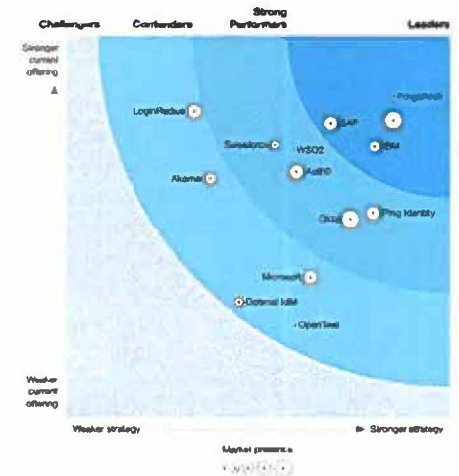
Figure 1: Magic Quadrant for Access Management

Supporting Cost Analysis

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Current Integrated Tax Processing Systems

Virginia Tax's integrated tax processing systems were implemented more than a fifteen (15) years ago, were not designed to support many online use cases, and do not expose modern interfaces or services that online systems depend on. **Modernization of these systems is the top priority at the agency** to increase nimbleness and flexibility responding to legislative requests and changes, improve the agency's overall operational efficiency and effectiveness, maximize revenue channels, and enhance security. Until modernization occurs, development against current systems carries more risk, requires more effort, and functionality may need to be replaced or reengineered when modernization occurs.

Current Tax Processing Systems Increase Complexity

- Business rules and transactions on the current integrated tax processing systems are complex, tightly coupled, and difficult for someone without a detailed knowledge of the current systems and requirements to decipher and test. Any development effort that needs to integrate with current tax processing systems carries more risk and requires more effort to validate that issues are not introduced that negatively affect tax processing.

- This complexity makes it challenging to accurately estimate the development level of effort, and implementation requires involvement and support from business subject matter experts across the agency. The best way to manage this risk is to decompose this effort into multiple release phases that prioritize the most important functionality and capabilities. Each release phase will need several workgroups and analysis sessions with policy, operations, and technology stakeholders to determine what is feasible.

- Phase two (2) and four (4) of the implementation strategy will require the most testing around the transactional enhancements being deployed because they involve "writing" the most transactions to the underlying systems.

Customer Service Change Management Impacts

This initiative aims to establish an online channel and relationship with Tax Practitioners. Specific objectives include shifting routine phone inquiry requests, mailings, and faxes to web upload and/or self-service transactions. To achieve these objectives, **Virginia Tax will need to adapt its customer service roles, processes, and technology to support enhancements** to Tax Practitioner registration, online POA requests, and secure messaging. These enhancements necessitate training and allocating customer service staff to support online channels.

Organizational Change Management Impacts

- An online portal for Tax Practitioners requires the design, development, and deployment of functionality for customer service representatives to effectively support online users. This primarily includes the development of customer service enhancements for secure messaging and POA review and approval processing.

- Customer service staff will need need considerable engagement, documentation, training, and the ability to provide feedback prior to production deployment for them to effectively embrace, adopt, and use new support capabilities. The training must focus on minimizing disclosure and policy risks associated with online communications.

- Tax practitioners are likely to continue to use their dedicated hotline(s) for urgent client tax matters due to the relatively low wait time when compared to secure messaging. However, simplified document exchange online will augment existing channels and will be more efficient and secure than mail or fax for exchange of information.

COST SAVINGS ANALYSIS

—

Estimate $95,000 - $150,000 incremental annual savings based on historical data

Reducing calls and inbound POA mail / fax processing are primary drivers

Other benefits to online access (e.g., increase timely filing / payments; set up payment plans to increase collections) may increase return on investment (ROI) – but the low historical volume of outbound correspondence does not indicate significant benefit opportunities.

May 2020 – April 2021

Agency Data on Tax Practitioners and Authorized Agents

Estimated Yearly Direct Cost Savings	Web Upload	Web Transaction
Outbound Mail (Reduce 40%)	$3,600	
Inbound Mail (Convert 50%)	$1,500	$10,500
Inbound Fax (Convert 60%)	$6,900	$52,700
Hotline Calls (Reduce 40%)	$83,500	
Total	**$95,600**	**$150,400**

Assumptions
Given there are 19,950+ currently registered Authorized Agents...

- Historical outbound mail to authorized agents is lower than expected
  - Reducing outbound mail at scale can result in significant cost savings due to costs of postage and mail processing.

- Converting inbound calls, mail processing, and fax processing to web transactions represents the largest opportunity for cost savings
  - Web uploads has minimal cost savings because a customer service representative still needs to review the upload and process the transaction
  - Savings will decrease if conversion rates fall below targets
  - Savings will increase if the number of authorized agents increases

Cost Savings / ROI Analysis Supporting Data

from AR, Siebel, and Contact Center Teams

May 2020 – April 2021

Cost Categories	Amount
Hotline Calls (majority Tax Practitioners)	**12,770**
Business Hotline	2,600
Individual Hotline	10,170
Main Contact Center Calls (Hotline Calls x Estimated 175%)	**22,348**
Mailings	**23,530**
(Inbound) Power of Attorney	3,300
(Inbound) Authorized Agent Submissions	230
(Outbound) Mailings to Authorized Agents	20,000
Faxes	**14,760**
(Inbound) Power of Attorney	14,000
(Inbound) Authorized Agent Submissions	760

Cost Assumptions	Amount
Hourly Wage for Calculation	$19.23
Cost of Outbound Mail Processing	$0.50
Cost of Inbound Transaction (i.e.; call, mail, fax)	$6.00
Cost Inbound Web Transaction (i.e.; upload, message)	$5.50
Cost of Self-Service Web Transaction	Minimal (e.g., $0.05)

Detailed Work Estimate Breakdown

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Estimation Process

Functional Decomposition

* Decomposed identified scope into components, features, and functions

Bottom's Up: Fibonacci Estimation Process

* Estimated design, technical, functional, and business complexity

* Leveraged Fibonacci-scale to estimate the relative size and complexity of each function using the following points scale: 1, 2, 3, 5, 8, 13, 21, 34

Top Down: Resource Estimation Process

* Defined recommended team to implement proposed scope

* Allocated resources across months with target of 6-8-months per phase

* Added additional points / time for project support assumptions (next slide)

Validation

* Calculated number of points and person-hours in each release

* Validated estimated hours / point within 10% margin across releases (actual: 8.5%)

* Validated estimated hours per point >=30 and <= 40 to account for analysis, design, development, testing, oversight, business, etc. activities over multiple weeks/months

* Validated analysis, design, and business allocations consistent across phases

    * Analysis & design / development team ratio >= 45% and <= 55%

    * Business & oversight / development team ratio >= 45% and <= 55%

Release Phase	Estimated Points	Estimated Hrs	Estimated Hrs/Point
1 - Tax Practitioner Individual Accounts	358	~13,200	~36.9
2 - Tax Practitioner Individual Enhancements	380	~13,400	~35.3
3 - Tax Practitioner Business Accounts*	408	~13,800	~33.8
4 - Tax Practitioner Business Enhancements*	418	~15,000	~35.9
5 - Payroll Service Provider Accounts	434	~15,200	~35.0
6 - Payroll Service Provider Enhancements	242	~8,800	~36.4
Parking Lot	191	N/A	N/A

*There are 40+ business tax types and 20+ business / organization types

Phase 1:
Tax Practitioner
Individual Accounts

Establish online relationship with Tax Practitioners and provide access to individual client accounts

Release Summary

- Automates registration and enrollment for Tax Practitioners
- Adds POA upload alternative to mail and fax
- Enables secure messaging between Tax Practitioners and Virginia Tax
- Authorizes viewing individual client / account information

Estimated Return on Investment

- Reduces authorized agent registration mail/fax processing
- Reduces POA mail/fax processing
- Reduces contact center call volume for routine inquiry
- Reduces mailing copies of client correspondence
- Increases timely and accurate filing and payments

Summary of Feature-Based Estimates

Feature Name	Est. Points	Est. Hours
Manage User Session	24	886
Manage User Profile Information	12	443
Register / Enroll Tax Practitioner Account	29	1,070
Manage Tax Practitioner Secure Messages	8	295
Manage Tax Practitioner POAs (view, revoke, upload)	29	1,070
Manage Tax Practitioner Information	46	1,697
Manage (view) Individual Clients	20	738
Manage (view) Individual Client's Period Information	15	554
Manage Individual Client's Secure Messages	8	295
(Cust Svc) Support User Account	13	480
(Cust Svc) Review Uploaded POAs	19	701
(Cust Svc) Secure Messaging Enhancements	13	480
+Release Management Assumptions	122	4,502
TOTAL	358	13,210

Phase 2:
Tax Practitioner
Individual Enhancements

Add alerts, streamlined POA, and payment options for individual client accounts.

Release Summary

- Enables near real-time individual POA approval
- Allows Tax Practitioners to submit payments for individual clients
- Allows Tax Practitioners to setup payment plans for individual clients
- Implements aggregate individual client transaction views and alerts
- Consolidates view of Tax Practitioner's correspondence

Estimated Return on Investment

- Reduces/eliminates individual POA processing and wait time
- Increases collection of outstanding individual liabilities
- Increased adoption reduces *(applies to all subsequent releases)*:
  - Mailing copies of client correspondence
  - Contact center call volume
  - Late or inaccurate filing and payments

Summary of Feature-Based Estimates

Feature Name	Est. Points	Est. Hours
(Cust Svc) Review Uploaded POAs	16	565
(Individuals) Review / Manage POAs	57	2,012
Register/Enroll Tax Practitioner Account	16	565
Manage Tax Practitioner POAs (Upload; Client Approval)	21	741
Manage Alerts for (Individual) Clients	47	1,659
Manage Individual Clients	16	565
Manage Individual Client's Bank Accounts	14	494
Manage Individual Client's Period Information	14	494
Manage Individual Client's Outstanding Bills	24	847
Manage Individual Client's Scheduled Payments	13	459
Manage Individual Client's Tax Payments	20	706
+Release Management Assumptions	122	4,307
TOTAL	380	13,414

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Phase 3:
Tax Practitioner
Business Accounts

—

Expand Tax Practitioners access to view business client accounts from their consolidated profile

Release Summary

- Consolidates view of all clients (business and individual)
- Authorizes viewing business client / account information
  - 20+ business taxpayer types
  - 40+ business account types

Estimated Return on Investment

- Improves security and reduces risk for business client access
- Creates reusable services for business portal
- +Increased adoption ROI metrics

Summary of Feature-Based Estimates

Feature Name	Est. Points	Est. Hours
Manage (view) Business Clients (20+ business types)	92	3110
Manage (view) Business Client's Period Information (40+ account types)	170	5,746
Manage Busines Client's Secure Messages	11	372
Manage Business Client's Withholding Tax Information*	13	439
+Release Management Assumptions	122	4,124
TOTAL	408	13,790

*Separated for ease of organizing Payroll Service Provider Functionality in Release 5/6

Phase 4:
Tax Practitioner
Business Enhancements

Add alerts, streamlined POA, filing, and payment options for business client accounts.

Release Summary

- Enables near real-time business POA approval
  (consider prioritizing in phase 2 if phase 3 / 4 are not pursued)

- Allows Tax Practitioners to submit payments for business clients

- Allows Tax Practitioners to setup payment plans for business clients

- Allows Tax Practitioners to file taxes for business clients

- Implements aggregate client transaction views and alerts

Estimated Return on Investment

- Reduces/eliminates business POA processing and wait time

- Increases collection of outstanding business liabilities

- Eliminates the need to support Tax Preparers on Business iFile

- *+Increased adoption ROI metrics*

Summary of Feature-Based Estimates

Feature Name	Est. Points	Est. Hours
(Business) Review / Manage POAs	51	1,831
Manage Tax Practitioner POAs (Request Client Approval)	13	467
Manage Alerts for (Business) Clients	34	1,221
Manage Business Client's Bank Accounts	15	539
Manage Business Client's Period Information	8	287
Manage Business Client's Outstanding Bills	27	969
Manage Business Client's Scheduled Payments	12	431
Manage Business Client's Filing and Payments (approx. 60)	136	4,882
+Release Management Assumptions	122	4,380
TOTAL	418	15,006

Assumptions

In addition to the core development estimates, we **allocated 122 points** to account for the following types of activities on each release:

- **Infrastructure / Environment Setup**
  - Source control / dev ops config
  - Servers / networking / etc.
  - Dev / QA / UAT / Prod setup & changes
- **"Sprint 0" / Team Ramp Up**
  - Team onboarding / scope orientation
  - Backlog review, estimation, and planning
  - Access and local environment setup
- **Style Guide / Brand Standard refinements**
- **Development Change / Remediation**
  - Scope change requests
  - Bug identification, triage, and resolution

- **Review Processes**
  - User acceptance testing (UAT)
  - Accessibility and usability testing
  - Code reviews
  - EARB documentation and reviews
  - Vulnerability scans and tests
  - Performance tests
- **Virginia Tax Organizational Change Management**
  - Updated business processes for contact center
  - Training and knowledge transfer
- **Go-Live Readiness**
  - Communications, configuration, migration, cutover, etc.

Assumptions – Cost Estimates

Virginia Tax is responsible for using the level of effort to estimate the cost of the initiative, considering factors such as (but not limited to):

- **Cost of labor,** including the assumed rates of Virginia Tax resources, any contracted resources, and any consulting services

- **Cost of IT assets,** including but not limited to hardware, software, cloud services, and licenses

- **Cost of mailing / communications** to communicate the change and expectations to affected stakeholders

- **Cost of procurement,** including the time to prepare a proposal, evaluate responses, negotiate terms, and engage a contract

In addition to these largely tangible costs, Virginia Tax must also consider:

- **Potential opportunity costs** of allocating resources to support this initiative over other high-priority initiatives.

- **Prospective costs** of this effort against the larger modernization costs, and whether an online portal built utilizing current tax systems will need to be replaced or reengineered in the near to mid-term.

Payroll Service Provider Estimates

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Payroll Service Provider Capability Gaps Analysis

Payroll Service Providers need a new "Reporting Agent Authorization" access level that is distinct from the "Authorized Agent" and POA access used by other Tax Practitioners to effectively serve their clients. **The Reporting Agent Authorization was not a focus of House Bill No. 2060, and Virginia Tax does not currently support this access level.**

Impacts of Payroll Service Provider Capability Gaps

- The IRS provides a Reporting Agent Authorization to allow business entities to perform payroll services for other businesses. This includes signing and filing returns, making deposits and payments, receiving copies of tax information and correspondence, and aiding in penalty relief determinations for specific withholding tax matters.

- If Virginia Tax wants to expand the online portal experience to Payroll Service Providers, then the Reporting Agent Authorization level must be implemented along with supporting business processes. Establishing this authorization level requires careful review by policy, operations, and technology stakeholders to confirm compliance with law and underlying technical and business constraints.

- There is significant risk to taking on a major business process and access architecture change on aging systems where the priority is modernization. We recommend delaying the implementation of the Reporting Agent Authorization for Payroll Service Providers (i.e., Phases 5 and 6) until there is a clearer modernization roadmap and strategy.

Proposed Payroll Service Provider Release Schedule

Payroll Service Providers need a new "Reporting Agent Authorization" access level that is distinct from the "Authorized Agent" and POA access used by other Tax Practitioners to effectively serve their clients. The "Reporting Agent Authorization" was not a focus of House Bill No. 2060, and Virginia Tax does not currently support this access level. The schedule below assumes all policy and legislative reviews have occurred to allow detailed analysis and development to begin in month one (1).

Legend:
- Full time
- Part time
- Lower Priority

Phases:
- Payroll Service Provider Accounts
- Payroll Service Provider Enhancements

MONTHS

Role											
Solution Mgr.											
BSA / QA											
BSA / QA											
CX/UX Dir. (40%)											
UX Access. (10%)											
UX Architect											
Vis. Designer											
Tech Architect											
Developer											
Developer											
Developer											
Data Engineer											
PMO/EARB (20%)											
Bus SME x3					x1.5	x1.5	x1.5	x1.5	x1.5	x1.5	
B SME or AR Dev											
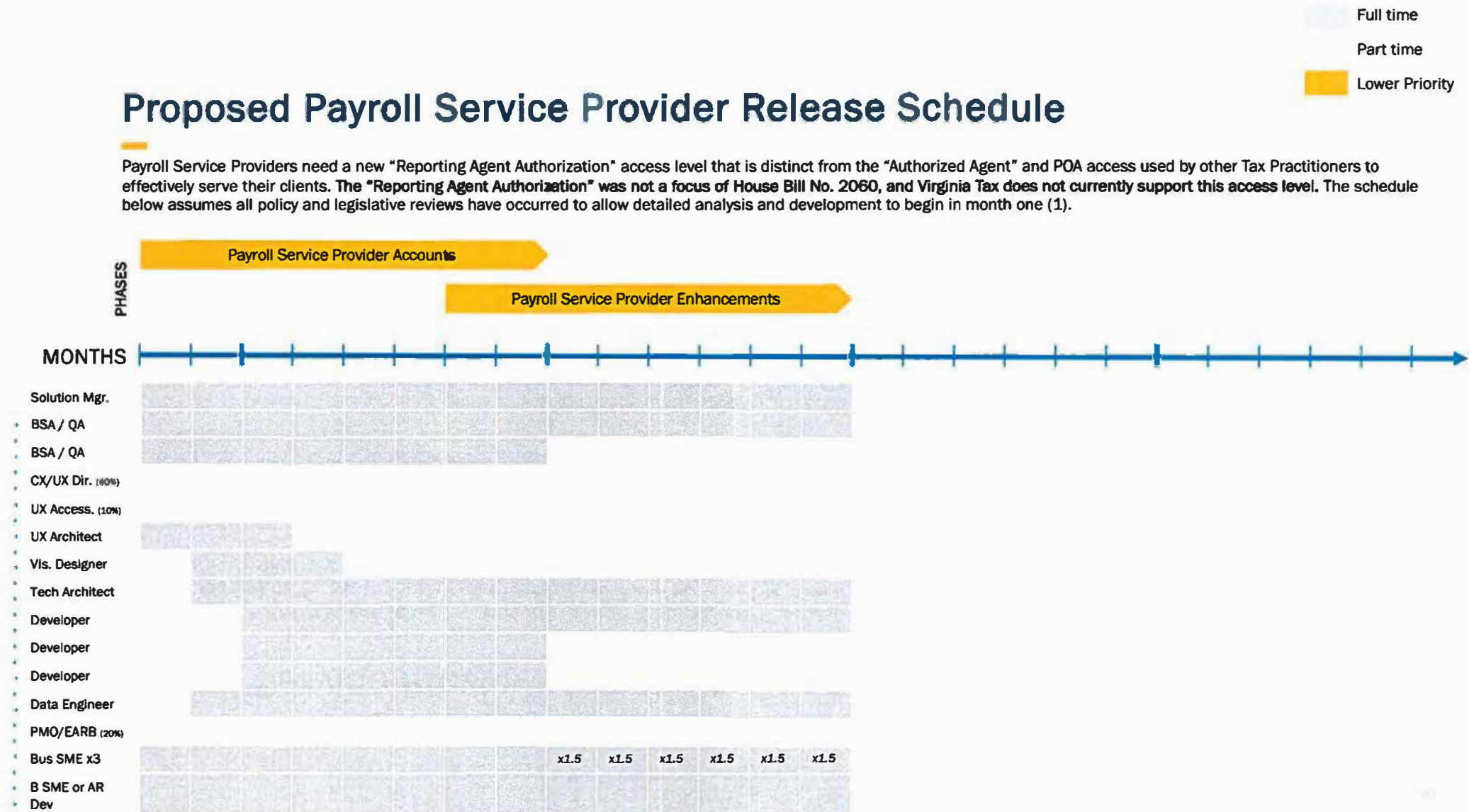
Proposed Payroll Service Provider Release Pricing

Estimated Cost Range

Payroll Service Provider Phases	Low Estimate	High Estimate
5 - PSP Accounts	$1.8 Million	$2.5 Million
6 - PSP Enhancements	$1.0 Million	$1.5 Million

*Pricing estimates subject to market conditions at time of projects, refined scope of phases, and several assumptions identified in detailed work estimate breakdown.

*Estimates include development and related resource costs from Virginia Tax and CapTech

Phase 5 & 6:
Payroll Service Provider (PSP)
Accounts

Add reporting agent access for Payroll Service
Providers to manage their business clients.

Release Summary

- Implements reporting agent authorization for PSP tax firm access
- Automates registration and enrollment for PSPs
- Enables administration of PSPs, their members, and their clients
- Authorizes viewing business client / withholding account info
- Allows PSP members to submit payments for business clients
- Allows PSP members to file taxes for business clients

Estimated Return on Investment

- Reduces contact center call volume for routine inquiry
- Improves security for business client access
- *+Increased adoption ROI metrics*

Summary of Feature-Based Estimates

Feature Name	Est. Points	Est. Hours
(Cust Svc) Review Uploaded Reporting Agent Authorizations	29	1,029
(Business) Review / Manage Reporting Agent Authorizations	51	1,809
Register / Enroll Payroll Service Provider (PSP) Account	156	5,533
Manage PSP Reporting Agent Authorizations (Client & Upload)	31	1,099
Manage Payroll Service Provider Members	29	1,029
Manage PSP Member Assignments	22	780
Manage PSP Member Information	22	780
Manage PSP's Business Clients	12	426
Manage PSP's Business Client's Bank Accounts	12	426
Manage PSP's Business Client's Period Information	24	851
Manage PSP's Business Client's Withholding Tax Information	4	142
Manage PSP's Business Client's Outstanding Bills	24	851
Manage PSP's Business Client's Scheduled Payments	12	426
Manage PSP's Business Client's Tax Filing and Payments	4	142
+Release Management Assumptions (2 Releases)	244 (122 x 2)	8,654
TOTAL	676	23,975

Supporting Analysis

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Customer First Project Charter

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The online portal is the place where Tax Practitioners start their day.

It allows Tax Practitioners to **efficiently serve their clients** with the confidence that they have the information they need to do their job effectively.

Online Portal / the Command Center

1 Allows Tax Practitioners the ability to access their clients' information in a single aggregate location.

Examples:

| FILING STATUS | CORRESPONDENCE | PAYMENT ALERTS |

2 Tax Practitioners can see which clients need their attention in real-time and can complete an array of filings and payments on their behalf.

Goals:

| SAVE TIME | INCREASE EFFECTIVENESS | REDUCE OFFLINE INTERCTION |

Persona & Use Cases

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Personas

Personas are representations of your living, breathing customers. Personas help focus conversations on the core features of the project, functionality and design, as well as on the wants and needs of the real users of the product.

- Aligns digital interactions and design decisions to appeal to target customer types before development begins.

- Builds empathy for customers and aligns the project team

- Guide current and future solutions as a checkpoint for customer perceptions

- Highlight feature gaps and new opportunities

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Tax Professional

40,000 est. tax professionals serving VA

> "My biggest frustration is having to call and take time to talk to a representative instead of **completing a task online.**"

TOP FRUSTRATIONS

| LACK OF RESPONSIVENESS & CLARITY | LIMITED AVAILABILITY OF TAX PAYER INFO |
| LENGTHY & UNCLEAR PROCESSES | LACK OF ONLINE SELF-SERVE FEATURES |

LIKELINESS OF USING NEW TECHNOLOGIES

85% are open to altering their methods if new tech is introduced

- 37% — Very Likely
- 48% — Likely
- 15% — Neutral

YEARS OF EXPERIENCE

75% have over **15** years of experience

- 75% — 15+
- 12% — 10-15
- 9% — 5-10
- 4% — 0-5

AGE

71% are over the age of **50**

27-37: **10%**   38-50: **19%**

- 57% — 51-69
- 14% — 70+

CLIENT TYPES

88% small businesses   **54%** high net worth individuals

85% married, filing jointly   **53%** married, filing independently

77% self-employed individuals **43%** medium to large businesses

77% single individuals

CLIENTS SERVED

44% personally serve over **250** clients annually

- 31% — 101-250
- 10% — 50-100
- 15% — <50

USE CASE #1

Establish a Digital Relationship

WISHLIST

1. Clear communication and status updates from Virginia Tax along the way
2. Secure message center with document upload

TOP COMMUNICATION CHANNELS

79% want to communicate via digital channels

	Preferred Interactions	Past Interactions
Email or Secure Message	79%	32%
Website	61%	94%
Call Customer Service	54%	77%

- Preferred Interactions
- Past Interactions

FILING

94% ELECTRONIC	2% PAPER	4% HYBRID

> Increase efficiency and speed of tasks/processes

USE CASE #2

Simplify Processes to Increase Compliance

WISHLIST

1. File POA electronically
2. Manage outstanding bills and set up payment plans online to remediate late or missing payments
3. Manage users/members within an organization- register new members, enroll existing users, update member assignments, and remove members

TOP TASKS EXPECTED TO BE ONLINE

- 87% CHECKING REFUND STATUS
- 84% FINDING INFO/INSTRUCTIONS/FORMS
- 81% FILING TAXES
- 75% VIEW TAXPAYER'S INFO

> Provide online self-serve options to encourage process and procedure compliance, reduce customer service inquiries, increase adoption

USE CASE #3

Communicate & Inform

WISHLIST

1. View transcripts, filings, payments, refund status, and correspondence from Virginia Tax to the taxpayer
2. View alerts for upcoming or modified deadlines, outstanding bills
3. Gain access to taxpayer historical Information
4. View estimated payments

TOP INFORMATION NEEDS

- 80% CORRESPONDENCE BETWEEN VIRGINIA TAX & PAYER
- 73% HISTORICAL TAX INFO
- 56% STATUS OF FILE/REFUND
- 38% POWER OF ATTORNEY

> Allow Tax Professionals to support clients in an efficient manner and proactively solve problems

Virginia Tax

Heuristic Analysis

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Heuristic Analysis

—

A **heuristic analysis** is an evaluation method in which one or more experts compare a digital product's design to a list of predefined design principles and identity where the product is not following those principles.

A HEURISTIC ANALYSIS IS USED TO:

- Identify the usability problems of a specific user flow and help determine the impact on the overall user experience

- Help evaluators focus on very specific problems such as as lack of feedback, poor discoverability, and recovery from errors

- Supplement other usability testing methods, especially when end users are difficult to reach

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Heuristics Approach

OVERVIEW

- We leveraged Jakob Nielsen's 10 general principles for interaction design (see adjacent).
- We also added accessibility to ensure that our analysis and recommendations address the needs of all users.

SCOPE

For the **Virginia Tax Practitioner Online Portal**, the following pages were evaluated:

- Virginia Tax Home Page
- Tax Preparer Registration
- iFile and Online Services for Businesses
- Tax Preparer Home Page

CRITERIA

01 / Visibility of system status

02 / Match between system and real world

03 / User control and freedom

04 / Consistency and standards

05 / Error prevention

06 / Recognition rather than recall

07 / Flexibility and efficiency of use

08 / Aesthetic and minimalist design

09 / Help users recognize, diagnose, and recover from errors

10 / Help and documentation

11 Accessibility

N N/g

Key Heuristic Analysis Takeaways

This heuristics analysis revealed several opportunities to improve the online user experience for Tax Practitioners. By focusing efforts on policy alignment, login processes and wayfinding, we can start to envision a more user-friendly online experience for this audience.

Paper Form Requirements Are Not Represented Online

When a Tax Practitioner completes certain registration and authorization processes in the online environment, they have every reason to believe they are acting in alignment with Virginia Tax policy. However, additional paper forms are often required to access or discuss specific client information. This disconnect can create compliance issues and drive unnecessary calls to Customer Service.

Tax Practitioners Need a More Direct Login Process

When Tax Practitioners arrive at the Virginia Tax website, they are immediately looking to log in and complete a set of tasks. Currently, it is unclear where exactly Tax Practitioners should go to get started. This group should be able to access a login form within seconds of landing on the home page, rather than clicking through multiple screens.

Core Tax Practitioner Tasks Are Scattered

The current layout is more of a resource and feature directory, rather than a centralized portal. It is difficult for Tax Practitioners to perform tasks for clients when they are constantly being redirected to different sections of the website. Backtracking is burdensome, and it is important that users always feel oriented.

Approach Summary

SEVERITY

The following scale was used to evaluate the common tasks that Tax Practitioners perform on the Virginia Tax website.

RATING	DESCRIPTION
Low	Some users may be inconvenienced and annoyed, but may still complete the task.
Medium	Most users are at risk of failing the task, misunderstanding a pattern, or spending more time correcting errors.
High	Almost all users will likely fail the task or misunderstand the pattern.

DEVICES

This heuristic analysis was conducted on desktop computer in a UAT environment.
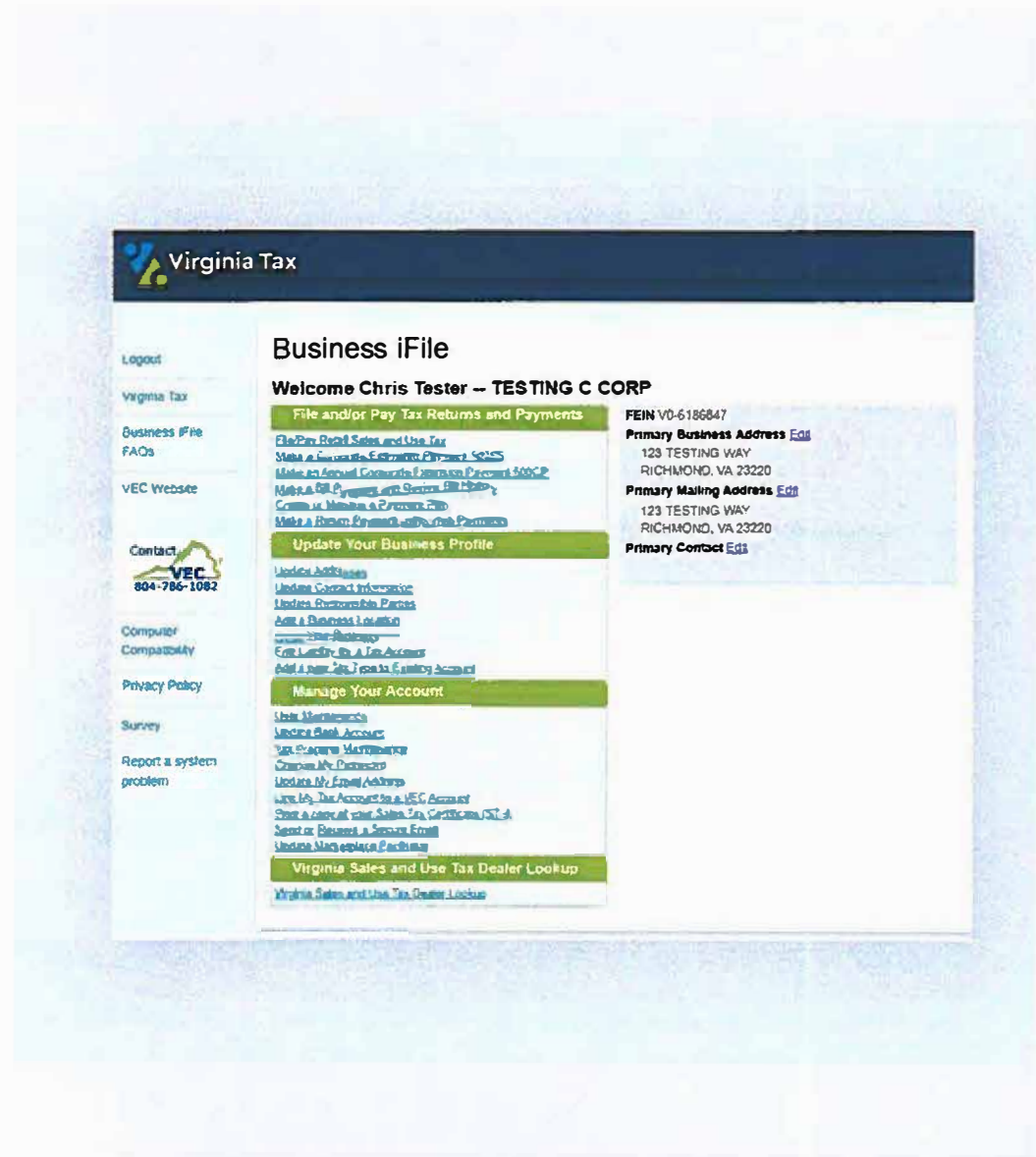
Key Themes

IDENTITY VERIFICATION

Virginia laws and agency rules dictate how Tax Practitioners and taxpayers can create and manage relationships. The current online user experience does not integrate with any taxpayer relationships (e.g.; Authorized Agent / Power of Attorney), and identity verification relies on the Tax Practitioner and business customer exchanging information offline to establish a relationship.

LOGIN

When Tax Practitioners land on the Virginia Tax Home Page, they must first sign-in to their account in order to complete tasks for clients. The current login process is lengthy and confusing.

WAYFINDING

Tax Practitioners need to know where they are on the site when completing tasks. Overloaded navigation bars, inconsistent page titles, and scattered features can make people feel lost.

Registration

DESCRIPTION

Currently, there is no mention of an R-7 or the "Virginia Authorized Agent" relationship on the tax preparer registration page. However, Tax Practitioners must complete an R-7 and PAR101 in order to receive an authorized agent number and establish a POA with their clients.

The current tax preparer registration form is an online-only construct with no online identity verification process and is entirely separate from formal taxpayer relationships.

This disconnect between two distinct registration tasks creates confusion for users.

HEURISTICS

- Match Between System and Real World
- Consistency and Standards
- Error Prevention

Theme: Policy

Power of Attorney

DESCRIPTION

Within Business iFile, Tax Practitioners can grant certain levels of permission to other users, including the ability to manage bank account information, prepare and file taxes, and make payments without completing any form of power of attorney, reporting agent authorization, or tax information authorization process.

These capabilities likely do not conflict with current laws in Virginia, but lack of online identity verification puts taxpayer information at increased risk.

HEURISTIC

Match Between System and Real World

Assign Tax Preparer

This page allows you to assign a Tax Preparer the authority to prepare, file and your taxes depending on the level of permission you assign

Enter the Unique Id given to you by your Tax Preparer: _____

Your Linked iFile Accounts

Select the level of permission you want your Tax Preparer to have.
- ● Master
- ○ Approver
- ○ Preparer

	Type	Name	User ID	Email Address
○	Master	Tester, Chris	testCCorp	testing@tax.virginia.gov
○	Master / Tax Preparer	testTesting	testTPOPCorp	test@tax.virginia.gov
○	Approver	TESTING, TESTING	testTPOPCorp2	test@tax.virginia.gov

[Modify User] [Add New User] [Delete User]

Back to my Home Page

Theme: Policy

Individual vs. Business

DESCRIPTION

When a user lands on the Virginia Tax home page, they have the option to log in as an Individual or as a Business.

For Tax Practitioners, it is not immediately clear which option they should select.

HEURISTIC

- Error Prevention

- Match Between System and Real World
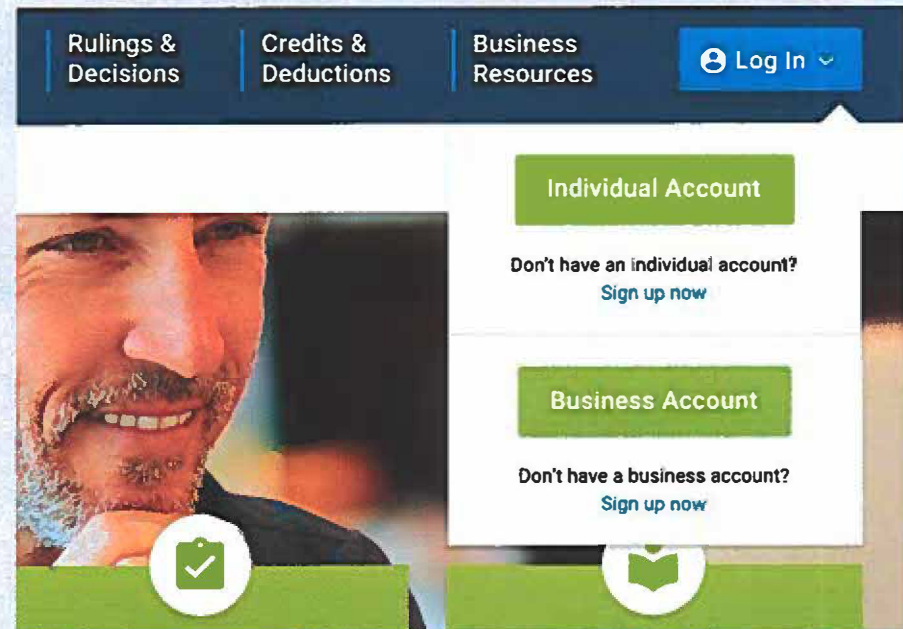
Theme: Login

Separate Login Forms

DESCRIPTION

There are currently two sperate logins for Tax Preparers and iFile users. The tax preparer login form must be accessed from the "Online Services for Businesses" page. When split into two options, users are likely to get confused.

At this point, most tax preparers will have visited at least three separate pages in order to arrive at the correct login form.

HEURISTIC

- Error Prevention

- Match Between System and Real World

- Aesthetics and Minimalist Design

Theme: Login

Navigation Bar

DESCRIPTION

Throughout iFile and Tax Preparer digital experiences, the navigation bar on the left frequently changes. It is easy for users to get confused and lose sight of where they are in a specific flow or task.

Much of the navigation bar content could live in a footer or somewhere else on the site. A simplified navigation bar would help users focus on the core experience.

HEURISTIC

- Visibility of System Status
- Consistency and Standards
- User Control and Freedom
- Accessibility

Theme: **Wayfinding**

Page Title Consistency

DESCRIPTION

Throughout the site, different titles are used to reference the same page. For example, "Tax Preparer Home" and "Home" will both take a user to the Home page.

Inconsistent page titles throw off a user's sense of orientation and generate feelings of uncertainty.

HEURISTIC

- Consistency and Standards
- Visibility of System Status

Theme: Wayfinding
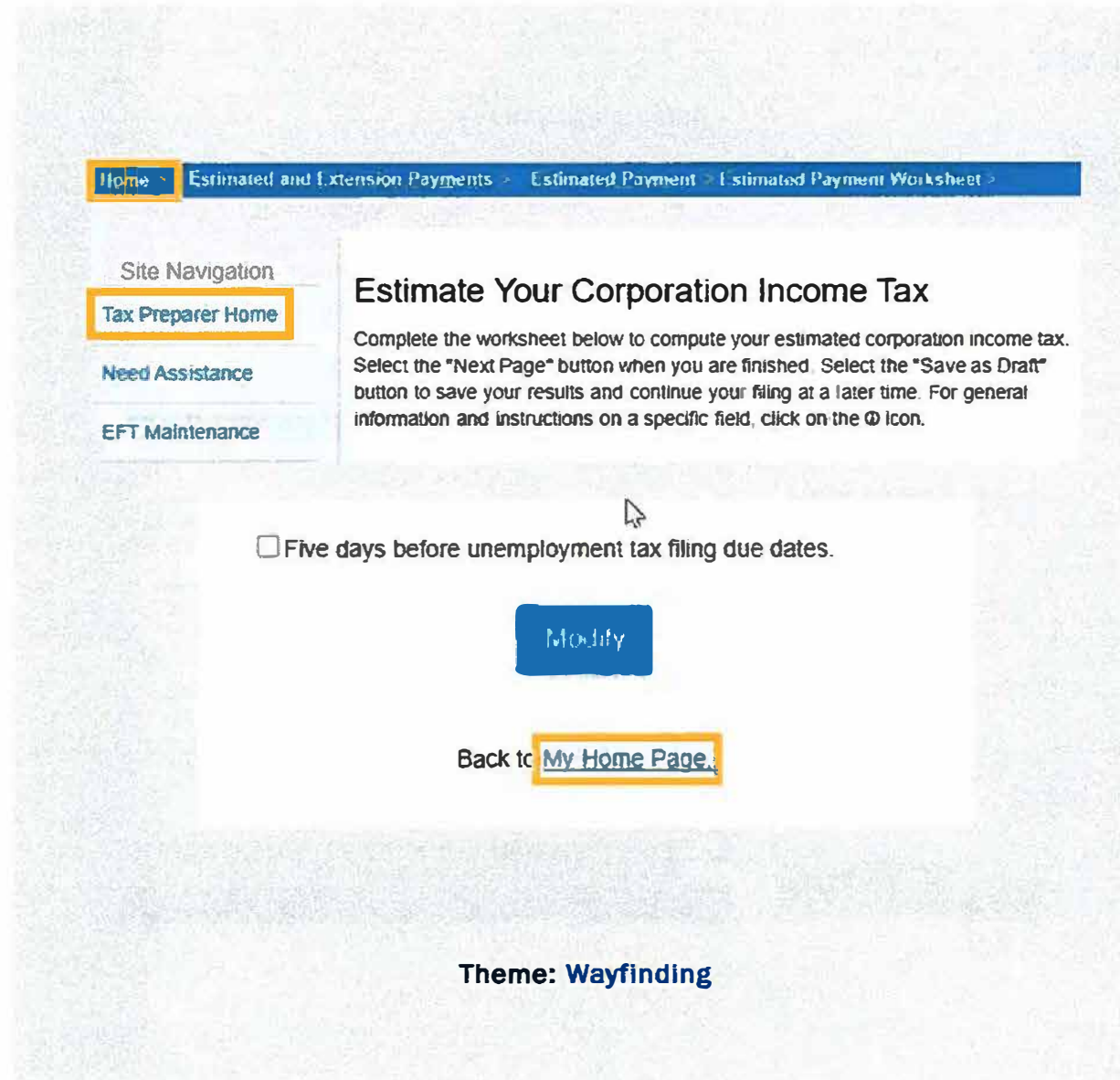
Prioritization of Tasks

DESCRIPTION

In the current digital experience, the core tasks that Tax Practitioners will be looking for are scattered throughout the site. The most important functions (File/Pay, E-forms, Web Upload, View History, etc.) are all relatively separated from one another.

If these features were centralized, Tax Practitioners would spend less time navigating the site.

HEURISTIC

- Flexibility and Efficiency of Use
- Aesthetic and Minimalist Design
- Accessibility

Theme: Wayfinding

Functional and Information Architecture Analysis

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Level 1
Virginia Tax Home
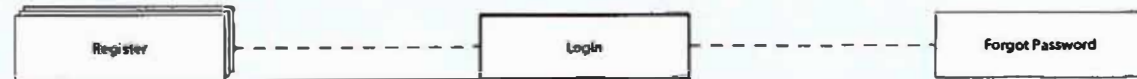
Level 2
Tax Professional Home

Level 3
Client Detail

Register — Login — Forgot Password

Tax Professional Dashboard (Home)

Alert Center (Aggregate) | Secure Messaging | Profile Management | Add Client (POA)

Client Detail

Client Info & Account Preferences | Correspondence | Payments | Filings/Returns

Make a Payment
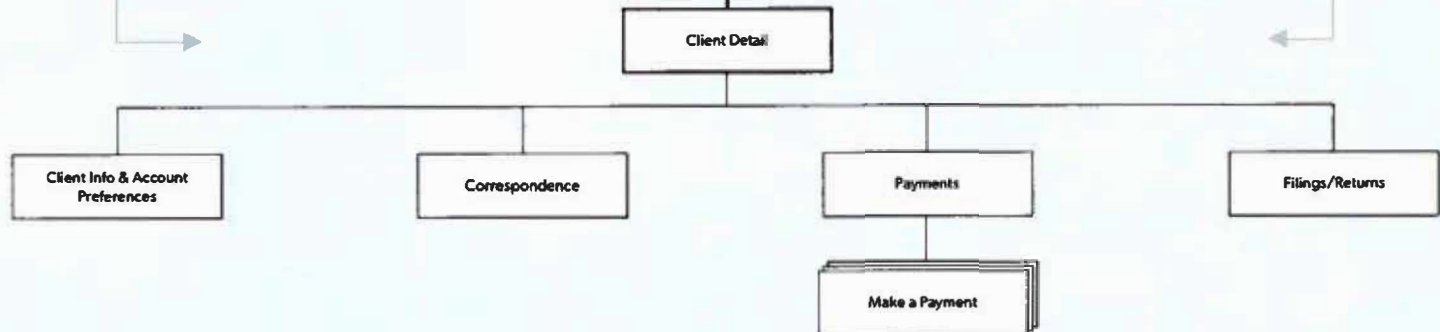
Stakeholder Needs

Component	Agency Representative	Authorized Agent	Individual	Business
User Account Management	●	●	●	●
Power of Attorney (POA) Management	●	●	●	●
Authorized Agent Management	●	●		
Secure Messaging	●	●	●	●
Authorized Taxpayer Management	●	●	●	●
Authorized Individual Taxpayer Management	●	●	●	
Authorized Business Taxpayer Management	●	●		●

Online Portal Relationships
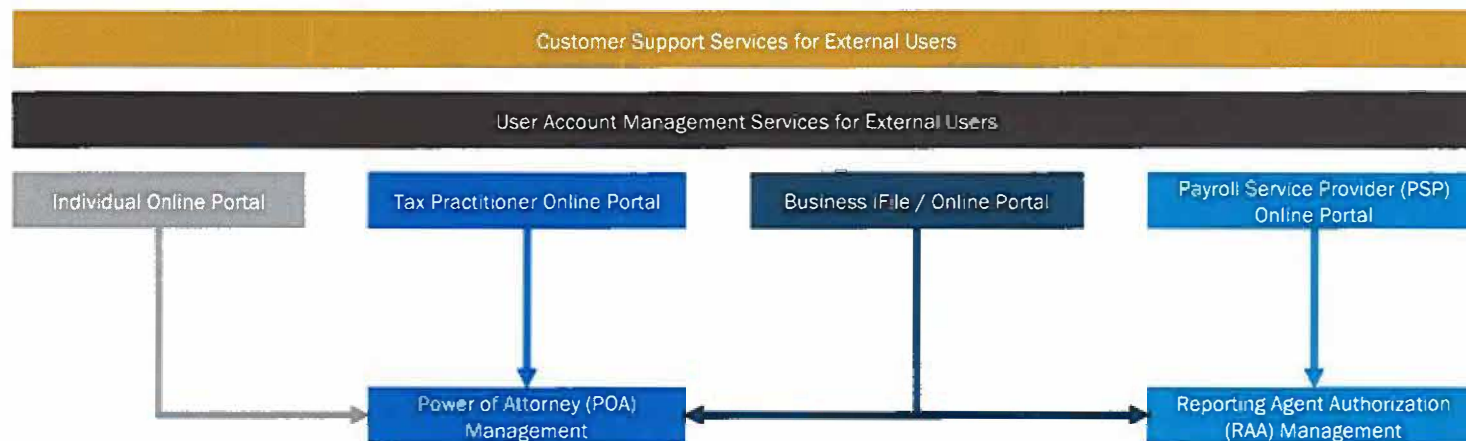
An Online Portal for Tax Practitioners Requires Enhancements to Multiple Online Portals

- Implementation of an online portal for Tax Practitioners also requires enhancements to User Account Management Services for External Users, Customer Support Services for External Users, the Individual Online Portal, and Business iFile / Online Portal

- If Payroll Service Provider functionality and Reporting Agent Authorization is implemented, then additional enhancements must be implemented to User Account Management Services for External Users, Customer Support Services for External Users, and Business iFile / Online Portal

Component Relationships

Connected Components

- Each major component of the Tax Practitioner Online Portal is comprised of features and functionality that meets their needs.

- Decomposing stakeholder needs into components, features, and functions supports the development of modular services with well defined contracts that are loosely coupled and allow for development and testing by teams in parallel.

- Leveraging cross-cutting services and utilities for authentication, authorization, logging, configuration management, and other underlying capabilities increases cohesion, simplifies maintenance, reduces time to identify issues, and helps mitigate risks.
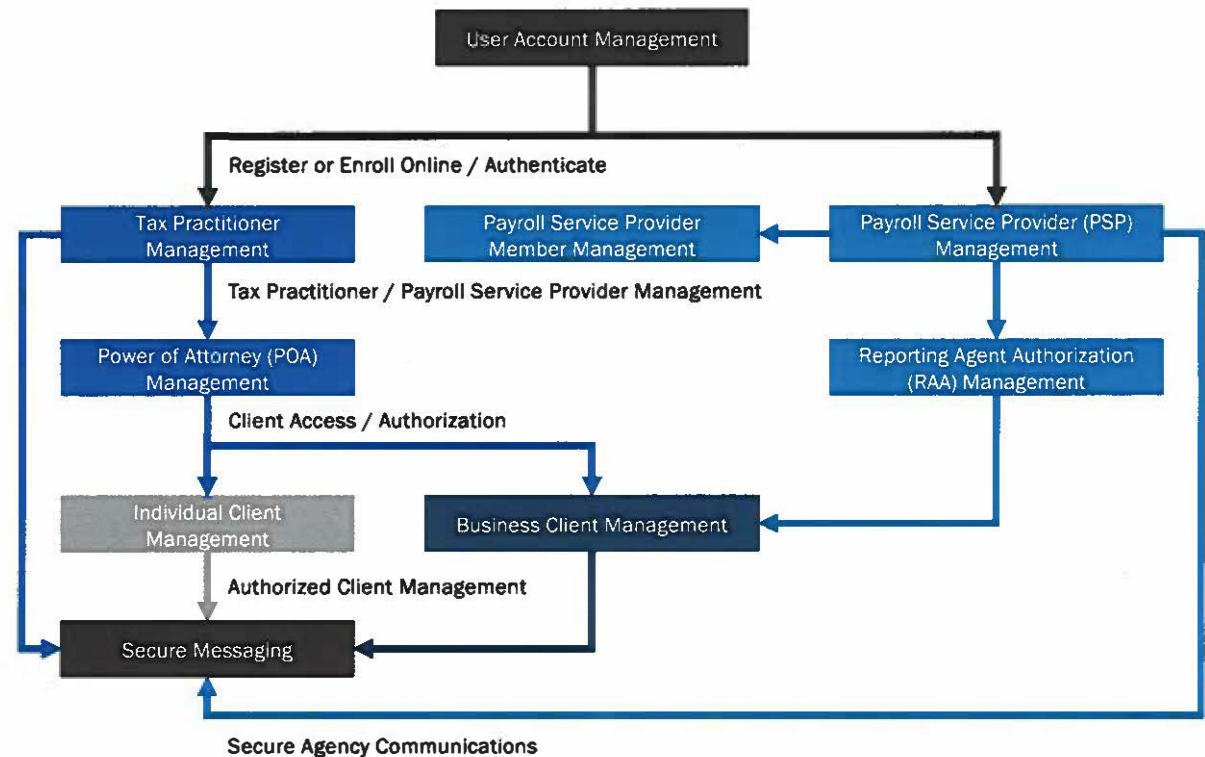
Component / Feature Relationships

User Account Management
- Manage User Session
- Manage User Profile Information
- (Cust Svc) Support User Account
- Register / Enroll Tax Practitioner
- Register / Enroll Payroll Service Provider

Tax Practitioner Management
- Manage Tax Practitioner Information
- (i.e.; Profile, Contact, Address, etc.)

Power of Attorney (POA) Management
- Manage Tax Practitioner POAs
- (Individual) Review POAs
- (Business) Review POAs
- (Cust Svc) Review POAs

Individual Client Management
- Manage Individual Clients Info
- Manage Individual Client's Bank Accounts
- Manage Individual Client's Period Info
- Manage Individual Client's Bills
- Manage Individual Client's Sched. Pmts.
- Manage Individual Clients Tax Payments
- Etc.

Client Management
- Aggregate Functions (e.g., Retrieve Clients)
- Manage Alerts

Payroll Service Provider (PSP) Management
- Manage PSP Information (i.e.; Profile, Contact, Address, etc.)

Payroll Service Provider Member Management
- Manage PSP Members
- Manage PSP Member Assignments
- Manage PSP Member Information

Reporting Agent Authorization (RAA) Management
- Manage PSP RAAs
- (Business) Review RAAs
- (Cust Svc) Review RAAs

Business Client Management
- Manage Business Clients Info
- Manage Business Client's Bank Accounts
- Manage Business Client's Period Info
- Manage Business Client's Bills
- Manage Business Client's Scheduled Pmts.
- Manage Business Clients Filings and Pmts.
- Etc.

Secure Messaging
- (Cust Svc) Manage Messages
- Manage Tax Practitioners Messages
- Manage Individual Clients Msgs.
- Manage Business Clients Msgs.

Functional Decomposition
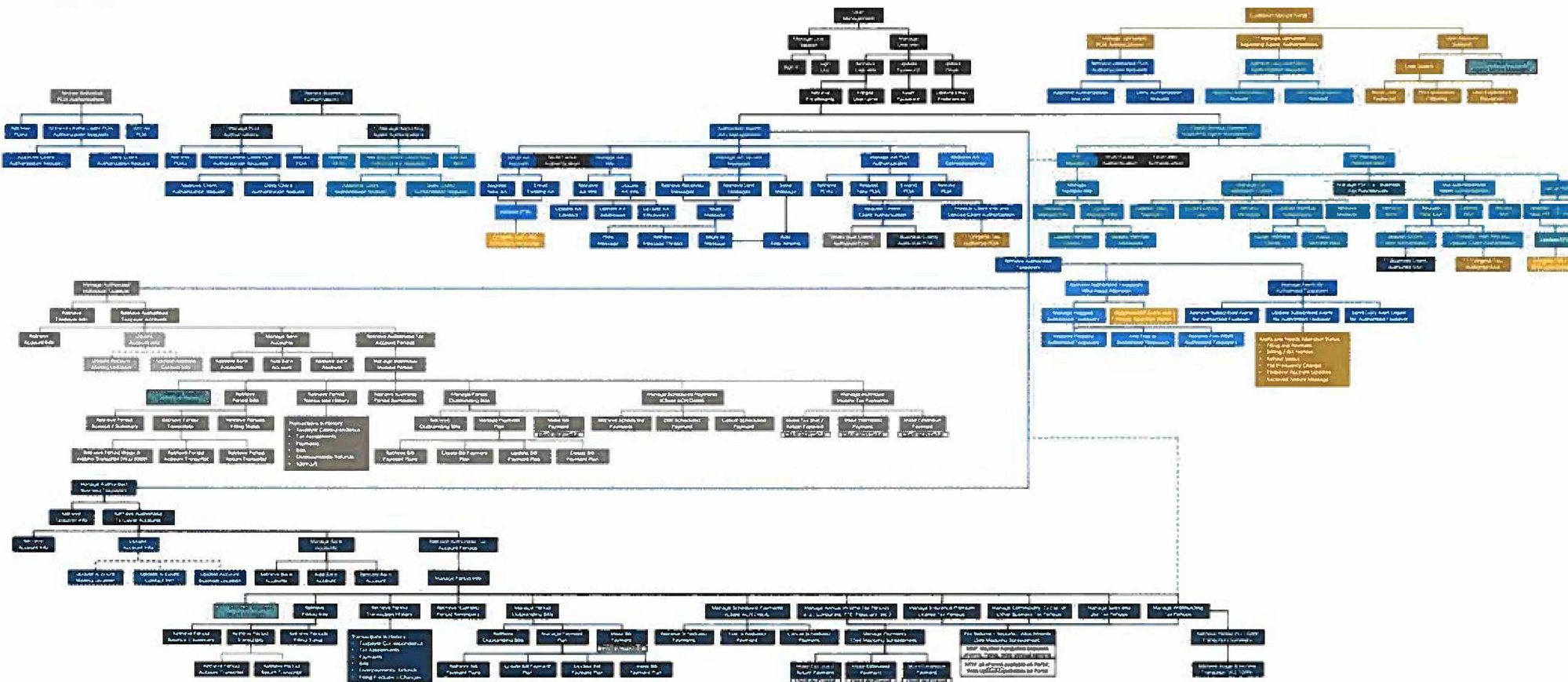
Virginia Authorized Agents (AA) include... [1]

...**any person** registered with the Virginia Department of Taxation as a representative for taxpayers. Authorized Agents are eligible to correspond with Virginia Tax by phone or to receive correspondence, documentation or other written materials that relate to tax matters on a **Virginia Power of Attorney and Declaration of Representative** form (PAR 101). [1]

Virginia Authorized Agents Include:

- Attorneys

- Certified public accountants

- Enrolled agents

- *Family members*

- *Corporate officers*

- *Other authorized tax preparers and individuals*

Needs

- Straightforward online POA process

- Access to authorized taxpayer and account info, key events / notifications, and correspondence

- Perform all filing and payment activities on behalf of taxpayer for authorized tax matters

*Tax professionals can register as authorized agents but **not all authorized agents are Tax Practitioners...***

[1] Form R-7

Tax Professionals – Secondary Personas

Virginia Authorized Tax Practitioners *(Registered as AAs)*

Primary Stakeholders

Enrolled Agents, Certified Public Accountants, Attorneys

Description

Tax practitioners serve as representatives for taxpayers by registering as Virginia Authorized Agents. Tax practitioners have varying taxpayer representation rights based on their credentials and qualifications. Tax Preparers are a subset of Tax Practitioners who possess a federal PTIN* and prepare for compensation, or who employs one or more persons to prepare for compensation, any return of tax or any claim for refund of tax. [1, 2]

Client Types

Individuals & Businesses

Needs

- Straightforward online POA process

- Access to authorized client and account info, key events / notifications, and correspondence

- Tax preparers need to be able to perform all filing (using PTIN) and payment activities on behalf of clients for authorized tax matters

Payroll Service Providers (PSP) *(Not registered as AAs)*

Primary Stakeholders

Large providers such as ADP and Paychex

Description

Third-party payroll service providers help companies meet filing deadlines and deposit requirements, greatly streamlining business operations. Primary services include administering payroll and employment taxes on behalf of employers. Employers are responsible for the deposit and payment of tax liabilities, even if the third-party fails to make the the tax payments. [3]

Client Types

Businesses

Needs

- Access to authorized client and account filing deadlines, deposit requirements, and related information necessary to administer payroll and employment taxes

- Ability to bulk-file and pay payroll and employment taxes

[1] Virginia PTIN Requirements for Tax Preparers
[2] Tax Preparer Definition

*Tax Preparer Identification Number (PTIN)

[3] IRS Outsourcing Payroll Duties

Power of Attorney (POA)

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Primary Access Level

Access Level	Power of Attorney and Declaration of Representative (POA) VA: R-7 / PAR-101; IRS: 2848 Users: CPAs, EAs, Attorneys
Why is authorization needed? (Purpose)	Authorize an individual to represent a taxpayer before Virginia Tax for specific tax matters. Representatives can receive and inspect confidential tax information and perform all acts a taxpayer can perform with respect to the specified tax matters. A representative's actions may increase or decrease a taxpayer's tax liabilities and legal rights.
Who can be authorized?	Any individual in Virginia may register as an Authorized Agent to serve as a representative for other taxpayers (businesses or individuals). *Tax practitioners must also supply their federally-issued preparer tax identification number (PTIN) if they assist in preparing tax returns for compensation.*
What limitations exist on correspondence?	Authorized to view all correspondence regarding the tax matters specified. Up to two (2) representatives can receive mailed copies of correspondence. *Correspondence is available online, and Tax Practitioners are encouraged to use online access and notifications over mail.*
How to become authorized?	Register as a Virginia Authorized Agent (Form R-7) then submit a Power of Attorney and Declaration of Representative (POA / Form PAR101). *Tax Practitioners are automatically set up as Virginia Authorized Agents (R-7) when they register online. Tax practitioners can submit their POAs online and incremental enhancements will enable near-real-time authorization via client online approval in the future.*
When does authorization expire?	Taxable years or periods may not extend more than 3 years into the future. At least one tax type and taxable year period must be specified.

# Other Potential Access Levels

Access Level	Tax Information Authorization (TIA) VA: R-7 / Doesn't Exist; IRS: 8821 Users: CPAs, EAs, Attorneys	Tax Firm / Reporting Agent Authorization (TFA/RAA) VA: Doesn't Exist; IRS: 8655 (Reporting Agent Authorization) Users: Payroll Service Providers (could be expanded)
Why is authorization needed? (Purpose)	Authorize any individual to inspect and/or receive a taxpayer's confidential information with respect to the specified tax matters. This authorization does not allow the designee(s) to represent the taxpayer before Virginia Tax.	Authorize a business entity to perform payroll services for other businesses. This includes signing and filing returns, making deposits and payments, receiving copies of tax information and correspondence, and aiding in penalty relief determinations for specific withholding tax matters. Taxpayers remains liable for the filing of returns and payment of tax in an accurate and timely manner.
Who can be authorized?	Any individual in Virginia may register as an Authorized Agent to inspect and/or receive information for other taxpayers (businesses or individuals).	Payroll Service Providers, including accounting service firms, franchisers, banks, service bureaus, and other business entities that perform payroll services for other business entities.
What limitations exist on correspondence?	Authorized to view all correspondence regarding the tax matters specified. Up to two (2) designees can receive mailed copies of correspondence less any POA representatives already receiving mailed copies.	Authorized to view correspondence regarding returns filed and deposits or payments made by the reporting agent.
How to become authorized?	**NOT AVAILABLE TODAY:** Register as a Virginia Authorized Agent (Form R-7) then submit a Tax Information Authorization (TBD).	**NOT AVAILABLE TODAY:** Register business as a payroll services provider, then submit a Reporting Agent Authorization (Form TBD). Alternatively, Virginia can choose to start accepting IRS Form 8655 that approve "State Authorization".
When does authorization expire?	Taxable years or periods may not extend more than 3 years into the future. At least one tax type and taxable year period must be specified.	Effective beginning with the specified period(s) and continues indefinitely unless terminated or revoked by the taxpayer or reporting agent. No authorization or authority is granted for periods prior to the period(s) indicated.

*Not included in estimates

*Included in Phase 5/6 estimates
*Requires all new business authorization process

Secure Message Upload

The first POA implementation allows upload of POA documents through the secure messaging channel as a more secure and efficient alternative to the current mail and fax options.
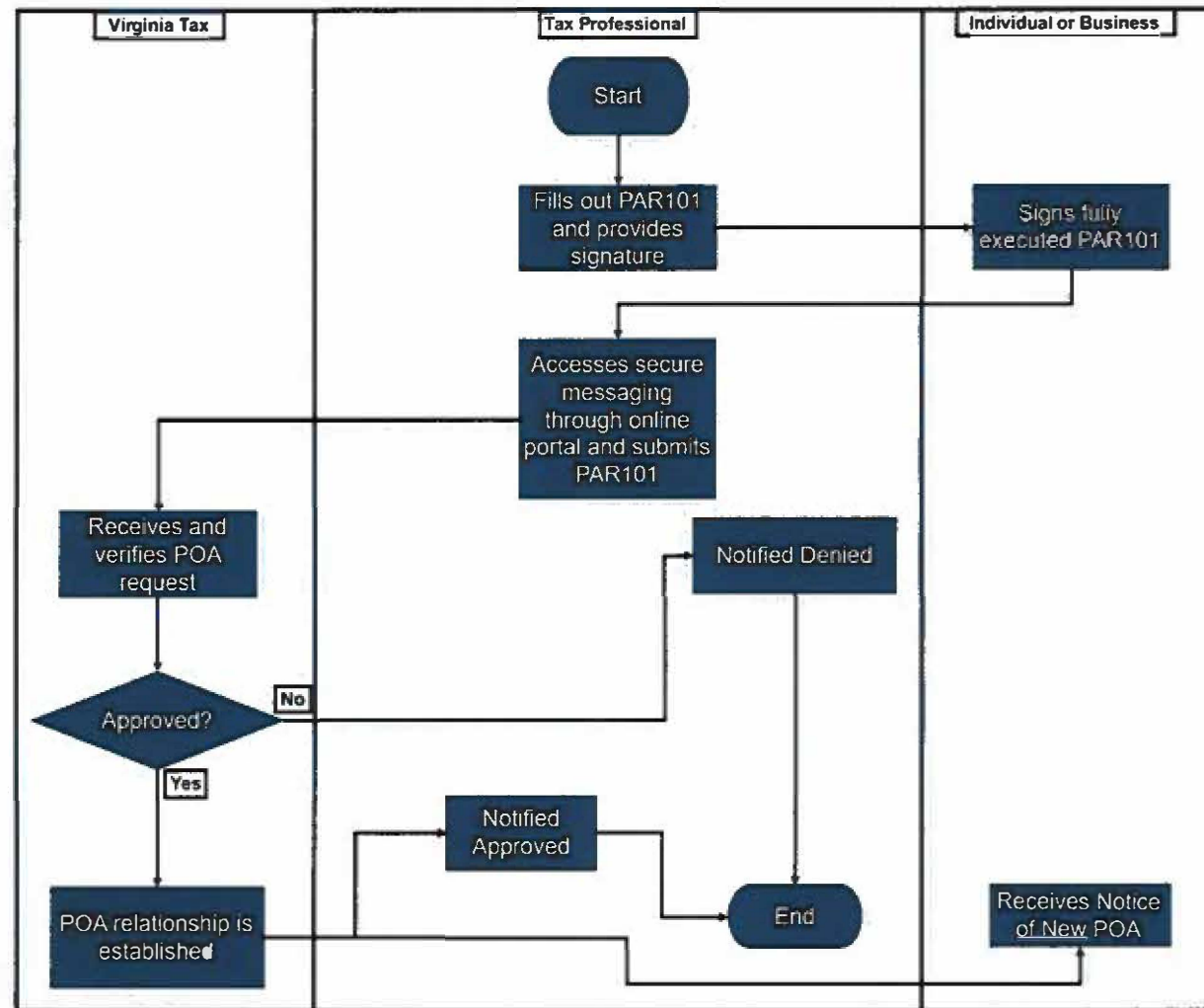
POA Enhancements

Upload POA

Tax Practitioner provides required power of attorney fields and uploads the PAR101 with representative and taxpayer signatures.

Individual Approval

Tax Practitioner provides required power of attorney fields and submits a request to individual taxpayer for approval by client in the individual online portal.

Business Approval

Tax Practitioner provides required power of attorney fields and submits a request to business taxpayer for approval in business iFile and/or new online portal.
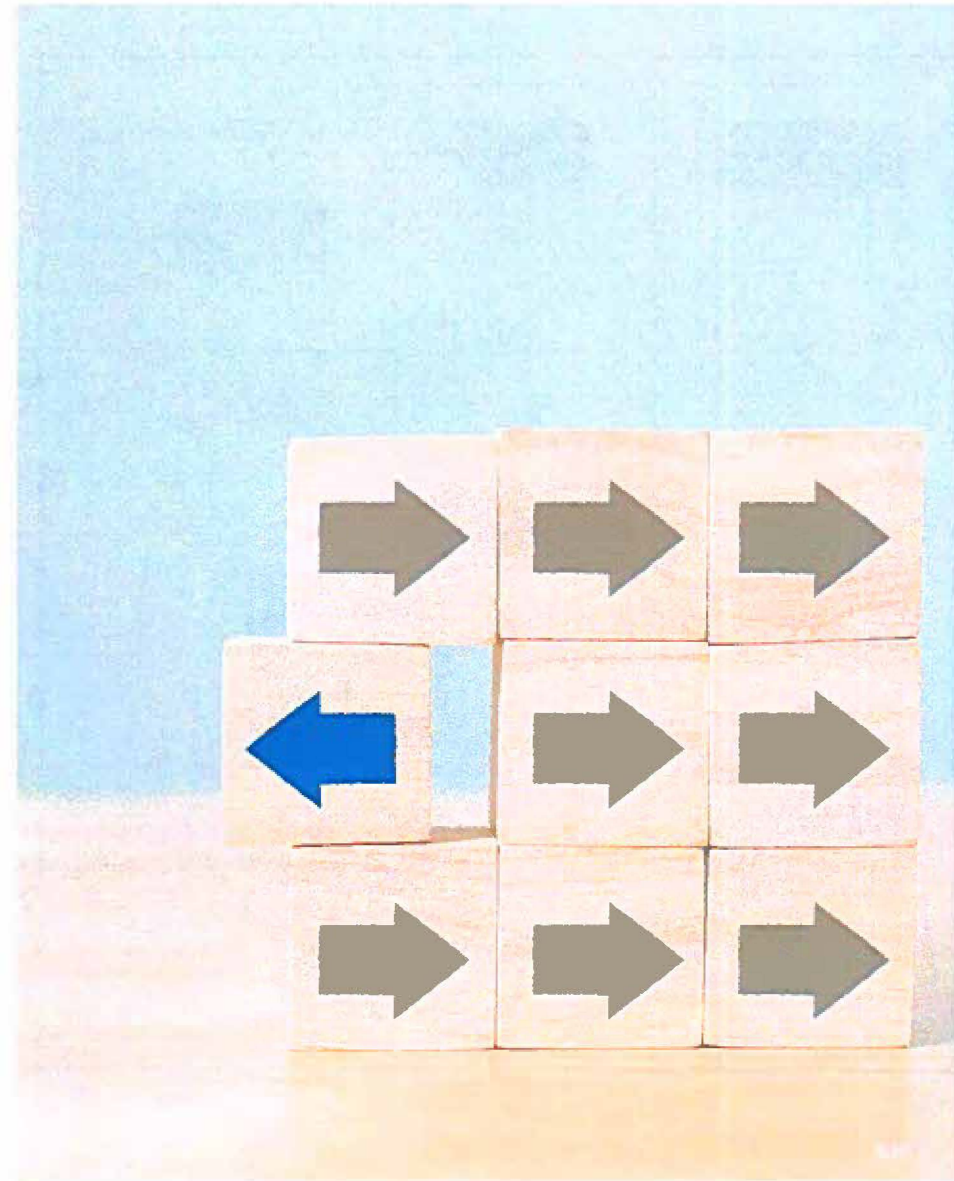
Upload POA

The first POA enhancement will allow Tax Practitioners to submit POA requests online. This enhancement will offer an option for PAR101 to be completed, signed, and uploaded within the portal, along with account authorization information. This enhancement streamlines the POA review process and serves as a gradual step towards client approval in subsequent phases.
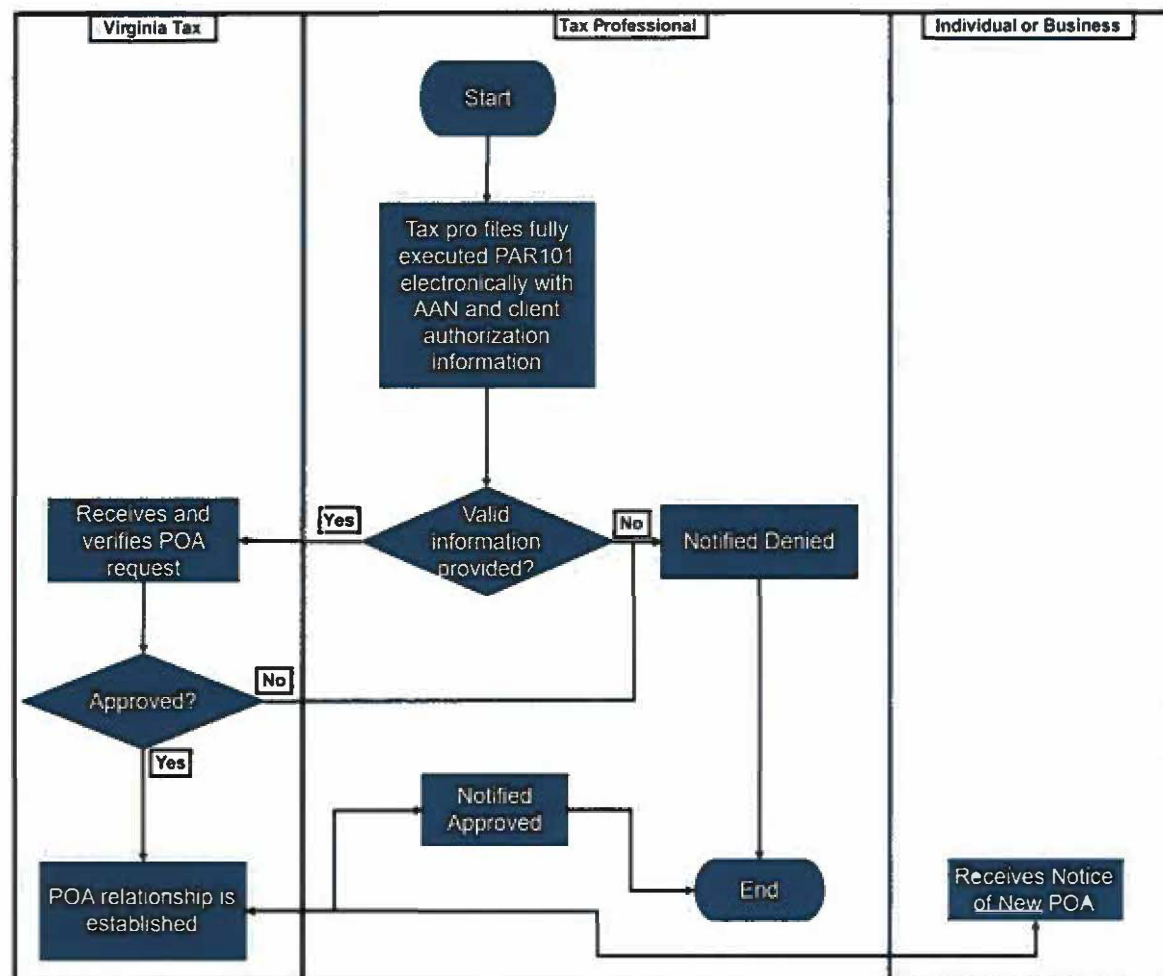
Individual Approval

The second POA enhancement will be implemented during Phase 2 (i.e.; Tax Practitioner Individual Enhancements) and enables individuals to view and approve POA requests submitted by their Tax Practitioner online. The POA will be established in near-real-time and this approach eliminates the need for the Customer Service to review and process the POA request.
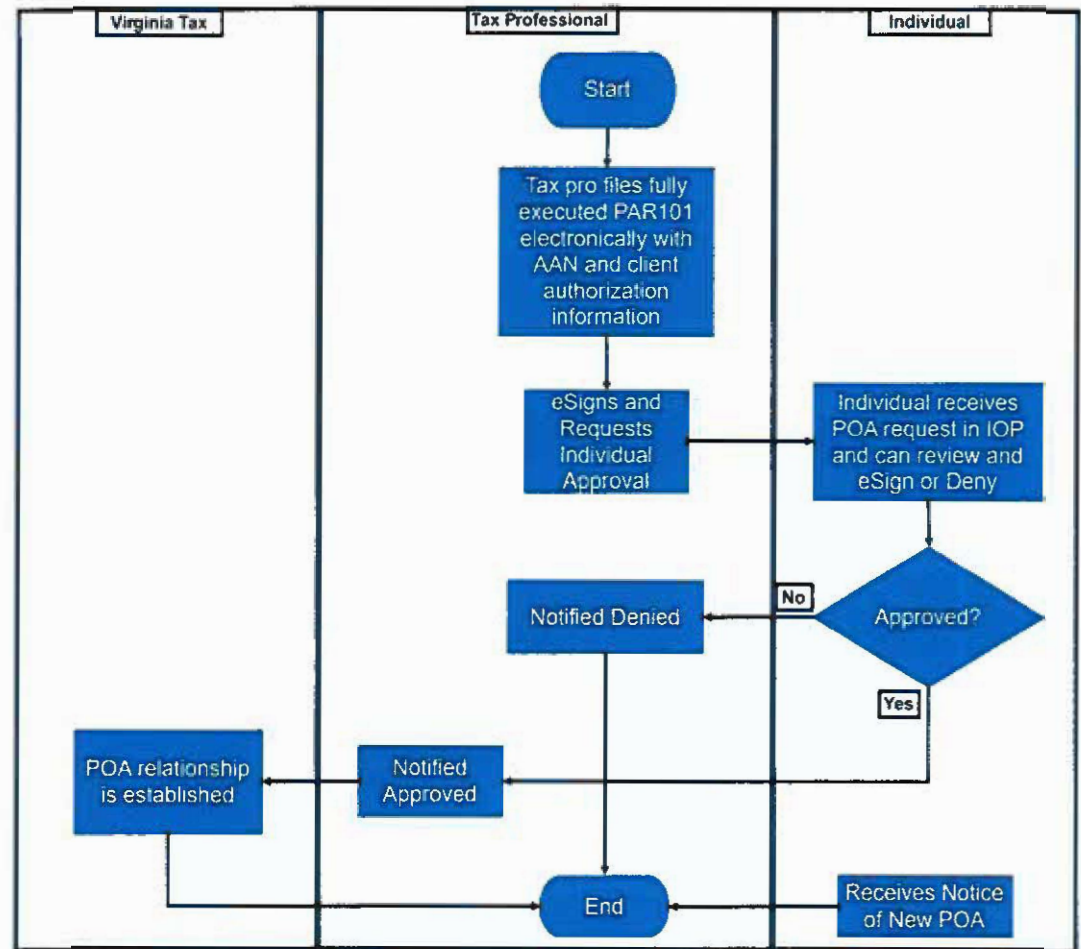
Business Approval

The third POA enhancement will be implemented during Phase 2, 3, or 4 (i.e.; Tax Practitioner Individual Enhancements, Business Accounts, or Business Enhancements) and enables business users to view and approve POA requests submitted by their Tax Practitioner online. The POA will be established in near-real-time and this approach eliminates the need for the Customer Service to review and process the POA request. We recommend implementing this enhancement in Phase 2 if Phases 3 and 4 are not pursued.
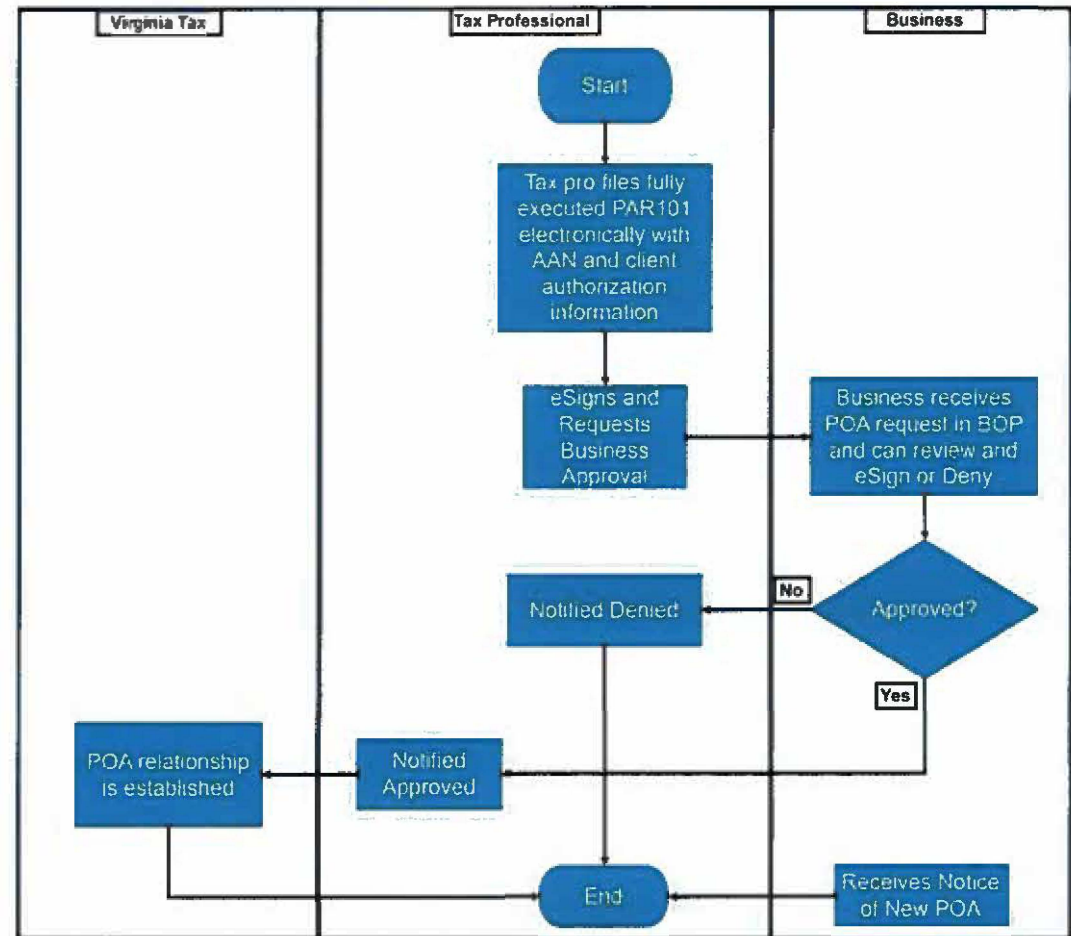
Optional POA Enhancements

Optional enhancements can increase automation in the POA upload process.

These enhancements aim to automate manual aspects of the POA review process and can include a check for signatures and information on POA documents. Faxed and mailed POAs can also potentially use this process once converted to electronic form.

Upload POA	POA Approval
▪ Automated systems verify taxpayer authorization information and information supplied on PAR-101	▪ Automated process to establish the POA relationship within AR upon approval of POA request ▪ Eliminates the need for customer service to manually enter POA information
▪ Use robotic process automation (RPA), optical character recognition (OCR), POA services, and/or other technologies to automate aspects of review, approval, and POA configuration on current tax processing systems	

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Thank you

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